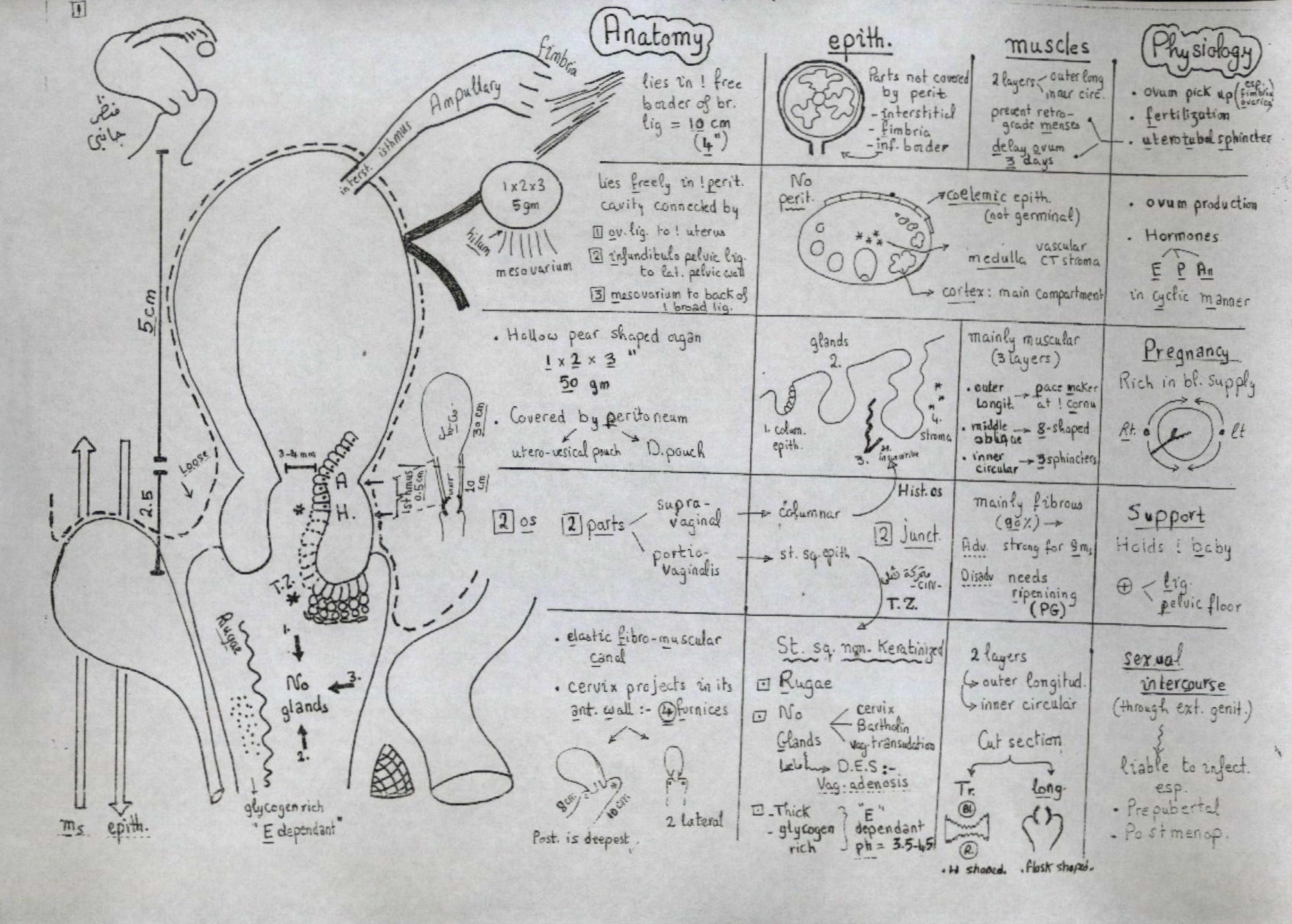

Dr. Mandouh

A_3 Gyna revision papers

2010




I
Anatomy
epith.
muscles
Physiology
fimbria
Ampullary
isthmus
interst.
فنجان جانبي
lies in ! free border of br. lig = 10 cm (4")
Parts not covered by perit
- interstitial
- fimbria
- inf. border
2 layers outer long inner circ.
prevent retrograde menses
delay ovum 3 days
• ovum pick up (esp. fimbria ovarica)
• fertilization
• uterotubal sphincter
1x2x3
5 gm
hilum
mesovarium
lies freely in ! perit. cavity connected by
1 ov. lig. to ! uterus
2 infundibulo pelvic lig. to lat. pelvic wall
3 mesovarium to back of ! broad lig.
No perit.
coelemic epith. (not germinal)
medulla vascular CT stroma
cortex: main compartment
• ovum production
• Hormones
E P An
in cyclic manner
5cm
2.5
Loose
• Hollow pear shaped organ
1 x 2 x 3 "
50 gm
• Covered by peritoneum
utero-vesical pouch
D. pouch
glands
2.
1. colum. epith.
3. 4. stroma
mainly muscular (3 layers)
• outer longit. → pace maker at ! cornu
• middle oblique → 8-shaped
• inner circular → 3 sphincters
Pregnancy
Rich in bl. supply
Rt.
lt
3-4 mm
A
H.
T.Z.
isthmus 0.5 cm
3.0 cm
1.0 cm
2 os
2 parts
supra-vaginal
portio-vaginalis
columnar
st. sq. epith
Hist. os
2 Junct.
T.Z.
-CIN-
mainly fibrous (90%) →
Adv. strong for 9 ms
Disadv needs ripenining (PG)
Support
Holds ! baby
⊕ lig. pelvic floor
Rugae
1.
No glands
3.
2.
glycogen rich
"E dependant"
ms
epith.
• elastic fibro-muscular canal
• cervix projects in its ant. wall :- 4 fornices
8 cm
10 cm
2 lateral
Post. is deepest
St. sq. non. Keratinized
Rugae
No Glands
cervix
Bartholin
vag. transudation
D.E.S :- Vag. adenosis
- Thick
- glycogen rich
"E" dependant
ph = 3.5-4.5
2 layers
outer longitud.
inner circular
Cut section
Tr.
long.
Bl
R
• H shaped.
• flask shaped.
sexual intercourse
(through ext. genit.)
liable to infect. esp.
• Prepubertal
• Postmenop.



↳ cushion during intercourse — pubis (veneris)

[4] Clitoris — 2.5–3 cm
- 2 crura
- body
- head
- suspensory lig.
- 2 corpora cavernosa

prepuce, frenulum

[5] ext. ureth. meatus — 3–4 cm — Skene's
Transitional epith. except distal 1/3 → st.

[2] labia majora — جلد عادى
2 elliptical skin folds
- Keratinized
- labial fat
- hair follicles
- sebaceous glands
- sweat (apocrine) glands

[6] Hymen
- st. sq. epith.
- reminants after defloration :- "Carauncula myrtiformis"

[3] labia minora — جلد رفيع أحمر
2 elliptical modified skin
- no keratin
- no fat
- no hair

enclosing ! vestibule
- ext. ureth. meatus
- vag. orifice (introitus)
- Barth. ducts

[7] vestibular bulb — 2 collections of vascular C.T.

fossa navicularis, fourchette, comissure

[8] Barthalin gland — in its lower 1/3 lies — غدة

Anatomy ↔ Significance:
- size of a pea
- gland: racemose
- duct: 2 cm (transit. epith.)

- Bartholinitis < acute / chronic
- ✓ Barth. cyst
- Adenocr. of Barth. — vulval surgery

Q Enumerate?

Vulva

↳ Bl. supply
- Internal pudendal a. ✓✓
- ± sup. & deep ext. pud. (femoral)

↳ Nerve supply
- Pudendal nerve ✓✓
- ±
  - perineal br. of lat. / post. cut. n. of thigh
  - ilio inguinal / hypogastric
  - genital br. of genito-femoral n.

↳ lymphatics = groin LN.

Vagina

↳ Bl. supply (very rich)
- uterine < descending cx-vaginal / circular a. of ! cx → ant. & post. azygous
- IIA → middle rectal, vaginal (Inf. vesical)
- Int. pud. → inferior rectal

↳ Nerve supply: upper part (insensitive) ---- lower 1/4 (pudendal)

↳ lymphatics: upper part (with cx) ---- lower 1/4 (with vulva)

Female genital mutilation ✓

Def. All procedures that involve partial / total removal of ext. genit. for cultural non-therapeutic reasons

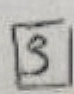
- It is still practiced in Egypt, Sudan — tradition ?! / african ?! / religious ?!
- It is tottaly condemned by ! WHO except — cosmetic / dyspareunia d.t. hypertrophy / Nymphomania

types
- I → prepuce or ! whole clitoris
- II → ⊕ labia minora
- III → all ! ext. genit. ⊕ narrowing of introitus } Sudaneese ☹
- IV → unclassified e.g. tatoo, piercing

Comp.

Immediate
- severe pain
- hge, inf.
- injury (urethra)

later on
- Psychological
- Retention dermoid
- obst. labor (fibrosis)
- Recurrent U.T.I



Blood supply

ant. & post. Coronary

br. to anast. with ov. a.

circular a. of cx.

cervico vaginal or descending cervical

ant. & post azygos a. of vagina

Thoracic duct

cysterna chylei

ovarian

L_2

obturator

Q Enumerate?

Post.
- Ilio-lumbar
- Lat. sacral
- Sup. gluteal

ant.

1) visceral
- uterine — sup. ... umb
- vesical — inf. ... vag
- rectal (middle)

2) muscular
- obturator

3) terminal — int. pud. / inf. glut.

Lymph drainage

نظري

sup.

deep

Inguinal

Cloquet

sup. (femoral)

deep

pelvic ureter

نظري ✓

12-15 cm

- Surface anatomy
- Sites of possible injury
  1. Hysterectomy < abd. / vag.
  2. Pelvic LN
  3. Bilat. Int. iliac a. lig
  4. Adenexectomy
- Injury is ↑ed by
  - Distorted anatomy < cong / acquired
  - Rapid blind clamping
- Injury is ↓ed by
  - Preoperative: IVP
  - introoperative: clamp should be < near the uterus / under vision
- Injury < direct / indirect / fistula / obstruction → hydronephrosis

Pelvic Support

1. AVF
2. Lig.
3. Pelvic floor
   ↓
   - peritoneum
   - pelvic fascia
   - pelvic diaphragm
   - Perineum

② ovarian

3 Corporeal

① Round

to labia majora

- structure within → ③ Br. lig.
- Vs: uterine, ov.
- F. tube
- reminents of Wolffian duct

obt. muscle

White line

Alcock's canal

ischio-rectal fossa

deep pouch

sup. pouch

$S_{3,4}$

$S_{2,3,4}$

2. ilio 3. ischio

coccygeus

1. pubo

the only true lig.

45-60°

3 cervical ✓

R

Cx

B

Peritoneum

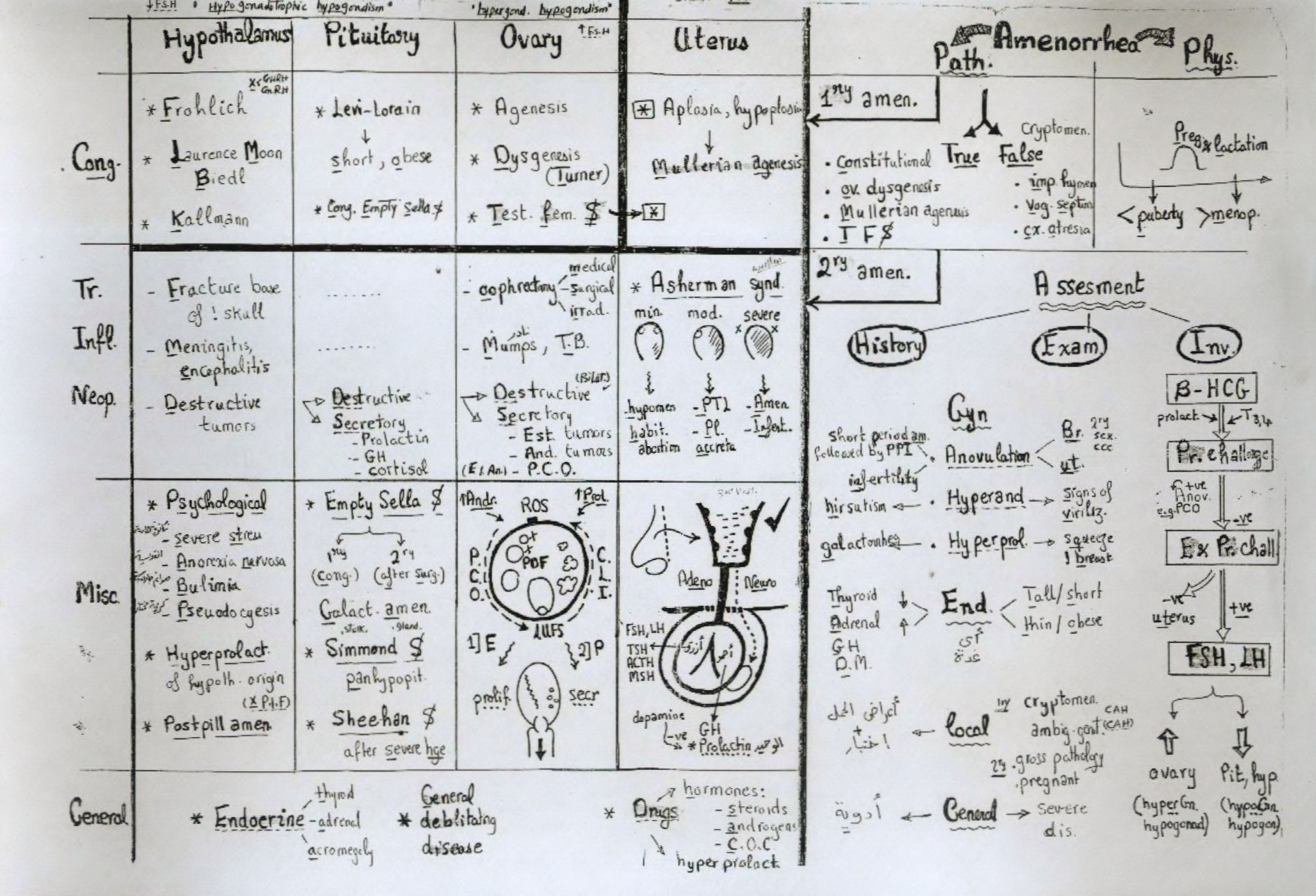
C

f

sup

deep

Skin



↑F.S.H • Hypogonadotrophic hypogondism"
'hypergond. hypogondism"
Hypothalamus
Pituitary
Ovary ↑F.S.H
Uterus
Amenorrhea
Path.
Phys.
Cong.
Tr.
Infl.
Neop.
Misc.
General
* Frohlich
* Laurence Moon Biedl
* Kallmann
* Levi-Lorain
short, obese
* Cong. Empty sella $
* Agenesis
* Dysgenesis (Turner)
* Test. fem. $
Aplasia, hypoplasia
Mullerian agenesis
- Fracture base of ! skull
- Meningitis, encephalitis
- Destructive tumors
Destructive
Secretory
- Prolactin
- GH
- cortisol
- oophrectomy
medical
surgical
irrad.
- Mumps, T.B.
Destructive (Bilat)
Secretory
- Est. tumors
- And. tumors
(E & An) - P.C.O.
* Asherman synd.
min.
mod.
severe
hypomen
habit. abortion
- PTL
- Pl. accreta
- Amen
- Infert.
* Psychological
- severe stress
- Anorexia nervosa
- Bulimia
- Pseudocyesis
* Hyperprolact. of hypoth. origin
* Postpill amen.
* Empty Sella $
1ry (cong.)
2ry (after surg.)
Galact. amen.
* Simmond $
panhypopit.
* Sheehan $
after severe hge
↑Andr.
ROS
↑Prol.
POF
P.C.O.
C.L.I.
LUFS
1] E
2] P
prolif.
secr
Adeno
Neuro
FSH, LH
TSH
ACTH
MSH
dopamine
-ve
GH
* Prolactin
* Endocrine
thyroid
adrenal
acromegaly
* General debilitating disease
* Drugs
hormones:
- steroids
- androgens
- C.O.C
hyper prolact.
1ry amen.
2ry amen.
True
False
Cryptomen.
- Constitutional
- ov. dysgenesis
- Mullerian agenesis
- T F $
- imp. hymen
- Vag. septum
- cx. atresia
Preg & lactation
< puberty
> menop.
Assesment
History
Exam
Inv.
Gyn
Short period am. followed by PPT
infertility
Anovulation
Br.
ut.
2ry sex. ccc
hirsutism
Hyperand
signs of viriliz.
galactorrhea
Hyperprol.
squeeze breast
Thyroid
Adrenal
GH
D.M.
End.
Tall / short
thin / obese
local
1ry cryptomen.
ambig. genit. (CAH)
2ry gross pathology
pregnant
General
Severe dis.
B-HCG
prolact.
T3,4
Pr. challenge
+ve Anov. e.g. PCO
-ve
E & Pr. chall
-ve uterus
+ve
FSH, LH
ovary (hyperGn hypogonad)
Pit, hyp (hypoGn hypogon)

"Androgen Insensitivity"

لاثنى 1^{ry} amen.

True ← · → False

	Turner $	M. agenesis	T.F.S.
Etiology	Absent X chrom. → failure of oocyte migration	Absent development of M. ducts: tubes, body, cx, upper 4/5 vag.	X-linked recessive → absent receptors to androgen (end organ insensitivity)
Karyotype	45 XO < m.b. mosaic + 46xx or 46xy	46 xx	46 xy
Phenotype	• short < 150 cm, web neck • shield chest • coarctation of aorta, cub. vulgus	Normal ♀	Normal & beautiful < 1. tall; 2. well developed Br.; 3. No Axillary or pubic hair
Gonad	streak	ovary	Testis < intra-abd.; in a hernia; in labia
Hormones :-	no E_2	E_2	Normal ♂ < test. 300 ng/dl; E_2 30 pg/mL
1) int. genit.	infantile	No uterus	No uterus
2) ext. genit.	infantile	vag. pouch	vag. pouch
3) 2^{ry} SCC	infantile	Breasts	Breasts
tt	• cyclic < P ..... للدم; E ..... ↑ Br., ut. N.B. ---- not < 13 yrs ⊕ GH (8 cm) • No oophrectomy except if Y chr. → malig. risk 25% "Dysgerminoma"	• Vaginoplasty: vag. (McIndoe), abd. (vaginal colo-plasty), lap. (Vachetti)	• Gonadectomy must be done (18 yr) < Breast, tall • ERT (no prog.) no uterus • vaginoplasty

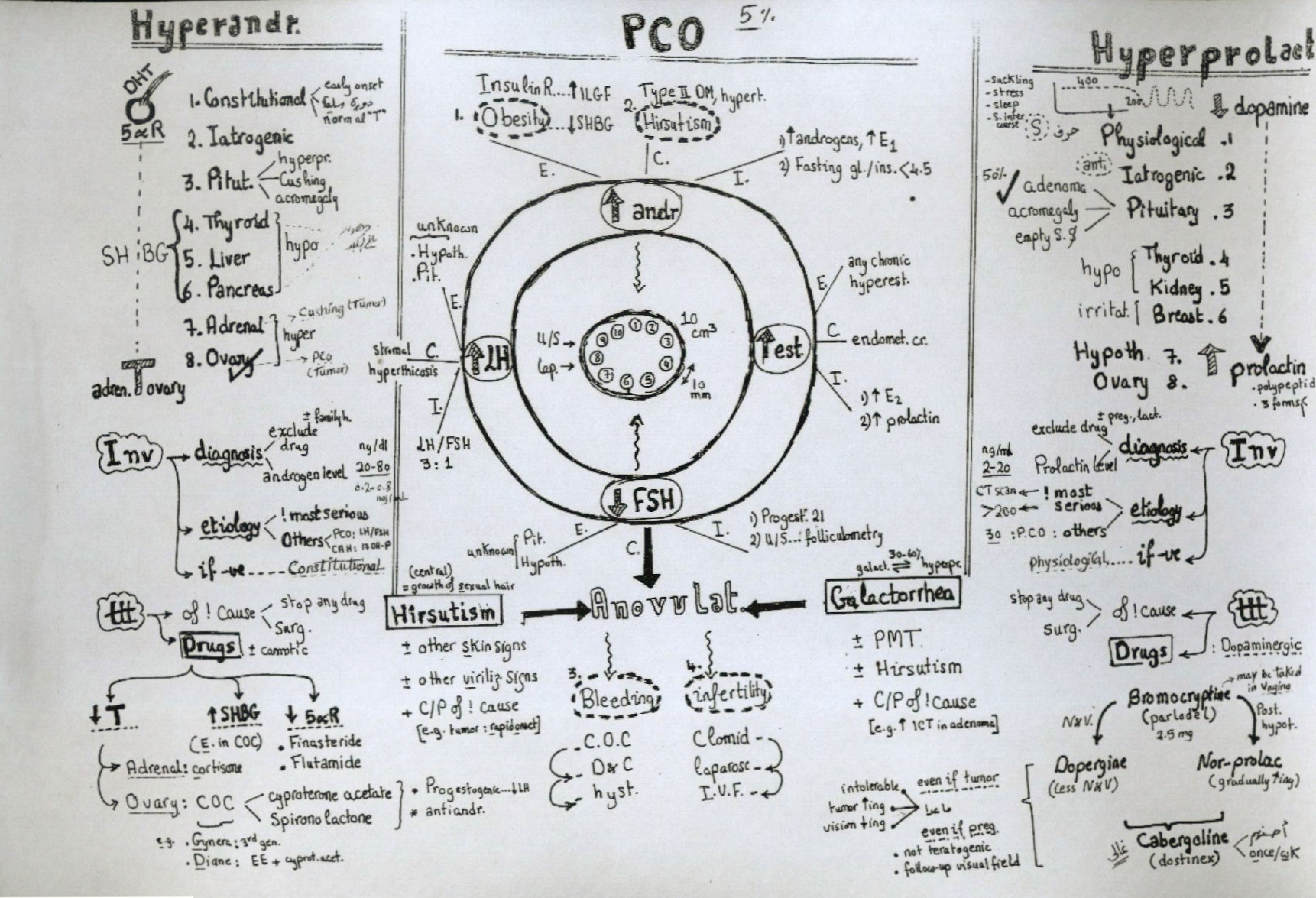
كل إمتى تحيلها دورة — كل إمتى تتق طويلة — كل إمتى تتشل فى وقت الولادة

ext. genit.: tubercle; swelling fold; تتحول لشفرات

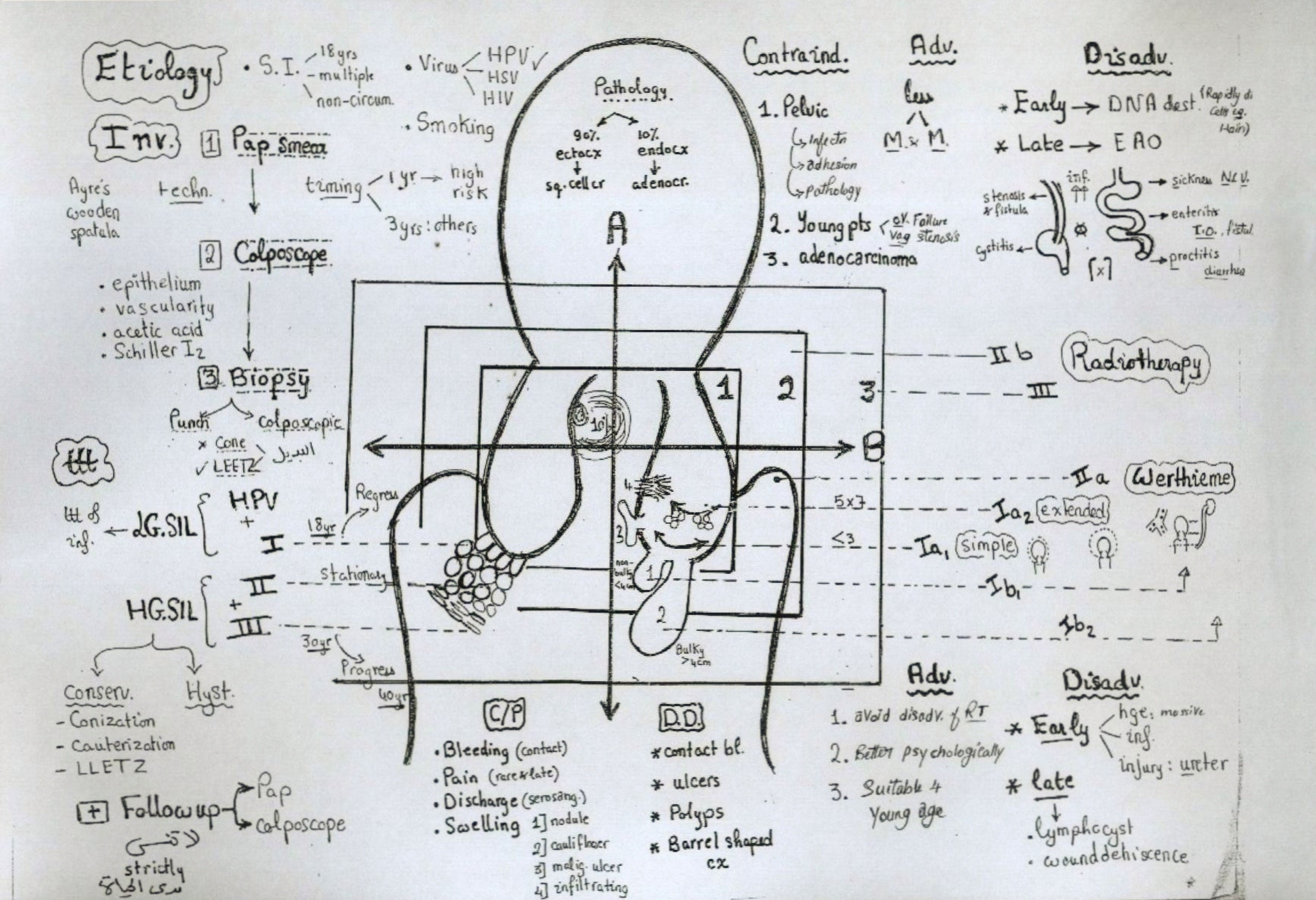
M · W · M

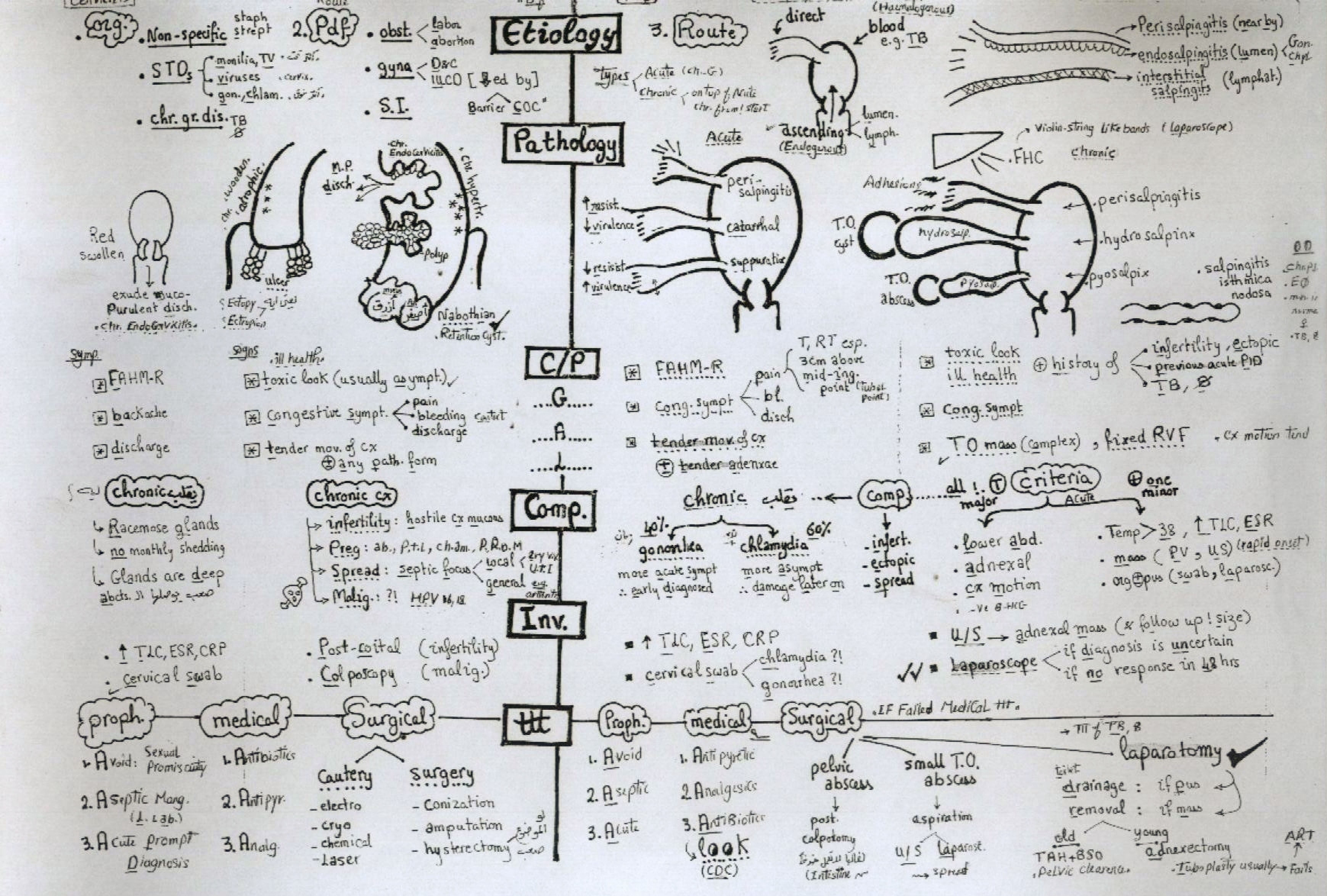
* If testis
M.I.F. (M. duct disapear)
test. (Wolf. duct only) — testic. descent

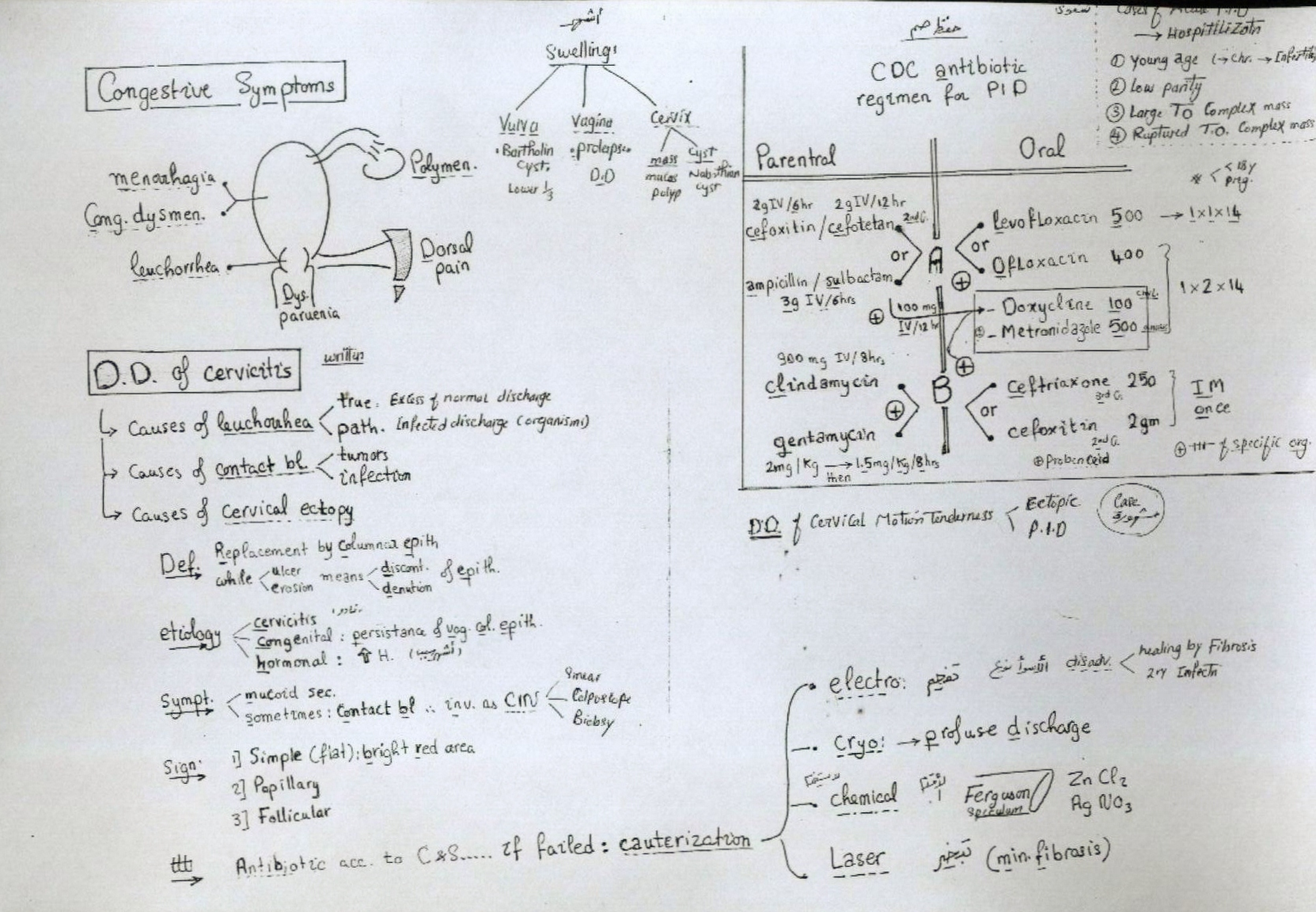
If ovaries
No MIF → M. ducts persists
No test. → Wolf. ducts disapear



Hyperandr.
PCO 5%
Hyperprolact
DHT
5αR
1. Constitutional
early onset
normal "T"
2. Iatrogenic
3. Pitut.
hyperpr.
Cushing
acromegaly
SHBG
4. Thyroid
5. Liver
6. Pancreas
hypo
7. Adrenal
8. Ovary
Cushing (Tumor)
hyper
PCo (Tumor)
adren. T ovary
Inv
diagnosis
± family h.
exclude drug
androgen level
ng/dl
20-80
etiology
! most serious
Others
PCO: LH/FSH
CAH: 17 OH-P
if -ve ---- Constitutional
ttt
of ! Cause
stop any drug
Surg.
Drugs
± cosmetic
↓T
↑SHBG
(E. in COC)
↓5αR
. Finasteride
. Flutamide
Adrenal: cortisone
Ovary: COC
cyproterone acetate
Spironolactone
* Progestogenic ... ↓LH
* antiandr.
e.g. . Gynera: 3rd gen.
. Diane: EE + cyprot. acet.
Insulin R. ... ↑ILGF
1. Obesity ... ↓SHBG
2. Hirsutism
Type II DM, hypert.
E.
C.
I.
1) ↑androgens, ↑E1
2) Fasting gl./ins. <4.5
↑ andr
unknown
. Hypoth.
. Pit.
Stromal hyperthicosis
↑LH
I.
LH/FSH 3:1
U/S →
lap. →
10 cm3
10 mm
↑ est
any chronic hyperest.
endomet. cr.
1) ↑ E2
2) ↑ prolactin
↓ FSH
unknown
Pit.
Hypoth.
1) Progest. 21
2) U/S ...: folliculometry
(central) = growth of sexual hair
Hirsutism
Anovulat.
galact. 30-60% hyperpr.
Galactorrhea
± other skin signs
± other viriliz. signs
+ C/P of ! cause
[e.g. tumor: rapid onset]
3. Bleeding
4. infertility
C.O.C
D&C
hyst.
Clomid
laparosc.
I.V.F.
± PMT
± Hirsutism
+ C/P of ! Cause
[e.g. ↑ ICT in adenoma]
- Suckling
- stress
- sleep
- S. intercourse
400
200
↓ dopamine
Physiological .1
ant.
Iatrogenic .2
50%
adenoma
acromegaly
empty S.S
Pituitary .3
hypo
Thyroid .4
Kidney .5
irritat.
Breast .6
Hypoth. 7.
Ovary 8.
↑ prolactin
. polypeptid
. 3 forms
± preg., lact.
exclude drug
diagnosis
Inv
ng/ml
2-20
Prolactin level
CT scan ← ! most serious
>200 ←
etiology
30 : P.CO : others
physiological .... if -ve
stop any drug
surg.
of ! cause
ttt
Drugs
: Dopaminergic
Bromocryptine (parlodel) 2.5 mg
may be taken in Vagina
N&V.
Post. hypot.
Dopergine (less N&V)
Nor-prolac (gradually ↑ing)
intolerable
tumor ↑ing
vision ↑ing
even if tumor
even if preg.
. not teratogenic
. follow-up visual field
Cabergoline (dostinex)
once/wk


Etiology
• S.I. – 18yrs – multiple – non-circum.
• Virus – HPV ✓ – HSV – HIV
• Smoking
Inv.
1 Pap smear
techn. Ayre's wooden spatula
timing – 1yr → high risk – 3yrs : others
2 Colposcope
• epithelium
• vascularity
• acetic acid
• Schiller I2
3 Biopsy
Punch – colposcopic
* Cone
✓ LEETZ
السلك
ttt
ttt of inf. ← LG.SIL { HPV + I
HG.SIL { II + III
18yr Regress
stationary
30yr Progress
40yr
Conserv. – Hyst.
- Conization
- Cauterization
- LLETZ
+ Follow up – Pap – colposcope
strictly
Pathology
90% ectocx ↓ sq. cell cr
10% endocx ↓ adenocr.
A
B
1 2 3
10%
non-bulky <4cm
Bulky >4cm
C/P
• Bleeding (contact)
• Pain (rare & late)
• Discharge (serosang.)
• Swelling 1] nodule 2] cauliflower 3] malig. ulcer 4] infiltrating
D.D.
* contact bl.
* ulcers
* Polyps
* Barrel shaped cx
Contraind.
1. Pelvic – infection – adhesion – pathology
2. Young pts – ov. failure – vag stenosis
3. adenocarcinoma
Adv.
M. & M.
Disadv.
* Early → DNA dest. (Rapidly di cells e.g. Hair)
* Late → EAO
stenosis & fistula
cystitis
sickness NV.
enteritis I.O. fistul
proctitis diarrhea
IIb
III
Radiotherapy
IIa
Werthieme
5x7
Ia2
extended
≤3
Ia1
simple
Ib1
Ib2
Adv.
1. avoid disadv. of RT
2. Better psychologically
3. Suitable 4 Young age
Disadv.
* Early – hge: massive – inf. – injury: ureter
* late ↓ • lymphocyst • wound dehiscence


Etiology
Pathology
C/P
Comp.
Inv.
ttt
org. Non-specific staph strept
STDs monilia, TV viruses gon., chlam.
chr. gr. dis. TB
2. Pdf
obst. labor abortion
gyna D&C IUCD
S.I.
3. Route
direct
blood e.g. TB
ascending
lumen.
lymph.
Perisalpingitis (nearby)
endosalpingitis (lumen)
interstitial salpingitis (lymphat.)
Acute
chronic
FHC
Violin-string like bands (laparoscope)
Red swollen
exude muco-purulent disch.
chr. EndoCervicitis
chr. atrophic
chr. hypertr.
M.P. disch.
ulcer
Ectopy
Ectropion
Polyp
Nabothian Retention cyst.
peri-salpingitis
catarrhal
suppurative
↑ resist. ↓ virulence
↓ resist. ↑ virulence
Adhesions
T.O. cyst
T.O. abscess
hydrosalp.
perisalpingitis
hydrosalpinx
pyosalpix
salpingitis isthmica nodosa
Symp.
FAHM-R
backache
discharge
Signs
ill health
toxic look (usually asympt.)
congestive sympt. pain bleeding discharge
tender mov. of cx
any path. form
FAHM-R
Cong. sympt pain bl. disch
T, RT esp. 3cm above mid-ing. point
tender mov. of cx
tender adenxae
toxic look ill health
history of infertility, ectopic previous acute PID TB
Cong. sympt
T.O mass (complex), fixed RVF
cx motion tend
chronic
Racemose glands
no monthly shedding
Glands are deep
chronic cx
infertility: hostile cx mucous
Preg: ab., P.T.L, ch.am., P.R.O.M
Spread: septic focus local general
Malig.: ?! HPV 16,18
chronic
40% gonorrhea more acute sympt ∴ early diagnosed
60% chlamydia more asympt ∴ damage later on
Comp
infert.
ectopic
spread
criteria
Acute
major
lower abd.
adnexal
cx motion
-ve B-HCG
one minor
Temp > 38, ↑ TLC, ESR
mass (PV, US) (rapid onset)
org pus (swab, laparosc.)
↑ TLC, ESR, CRP
cervical swab
Post-coital (infertility)
Colposcopy (malig.)
↑ TLC, ESR, CRP
cervical swab chlamydia ?! gonorrhea ?!
U/S → adnexal mass (follow up! size)
Laparoscope if diagnosis is uncertain if no response in 48 hrs
proph.
medical
Surgical
1. Avoid: Sexual promiscuity
2. Aseptic Mang.
3. Acute prompt Diagnosis
1. Antibiotics
2. Antipyr.
3. Analg.
Cautery
electro
cryo
chemical
Laser
surgery
Conization
amputation
hysterectomy
Proph.
1. Avoid
2. Aseptic
3. Acute
medical
1. Antipyretic
2. Analgesics
3. Antibiotics
look (CDC)
Surgical
IF Failed Medical ttt.
pelvic abscess
post. colpotomy
small T.O. abscess
aspiration
U/S
laparost.
spread
laparotomy
drainage: if pus
removal: if mass
old TAH+BSO
Pelvic clearance
young adnexectomy
Tuboplasty usually → Fails
ART



Congestive Symptoms

Swellings

- Vulva
  - Bartholin cyst, Lower 1/3
- Vagina
  - prolapse, D.D
- Cervix
  - mass: mucus polyp
  - cyst: Naboth cyst

D.D. of cervicitis

written

- Causes of leuchorrhea
  - true: Excess of normal discharge
  - path.: Infected discharge (organisms)
- Causes of contact bl.
  - tumors
  - infection
- Causes of cervical ectopy

Def. → Replacement by columnar epith
while ulcer / erosion means discont. / denudation of epith.

etiology →
- cervicitis
- congenital: persistance of vag. col. epith.
- hormonal: ⇑ H.

Sympt. →
- mucoid sec.
- sometimes: Contact bl ∴ inv. as CIN → Smear, Colposcope, Biopsy

Sign →
1] Simple (flat): bright red area
2] Papillary
3] Follicular

ttt → Antibiotic acc. to C&S..... If failed: cauterization
- electro: تفحيم — disadv.: healing by Fibrosis, 2ry Infectn
- cryo: → profuse discharge
- chemical — Ferguson speculum — $ZnCl_2$, $AgNO_3$
- Laser تبخير (min. fibrosis)

CDC antibiotic regimen for PID

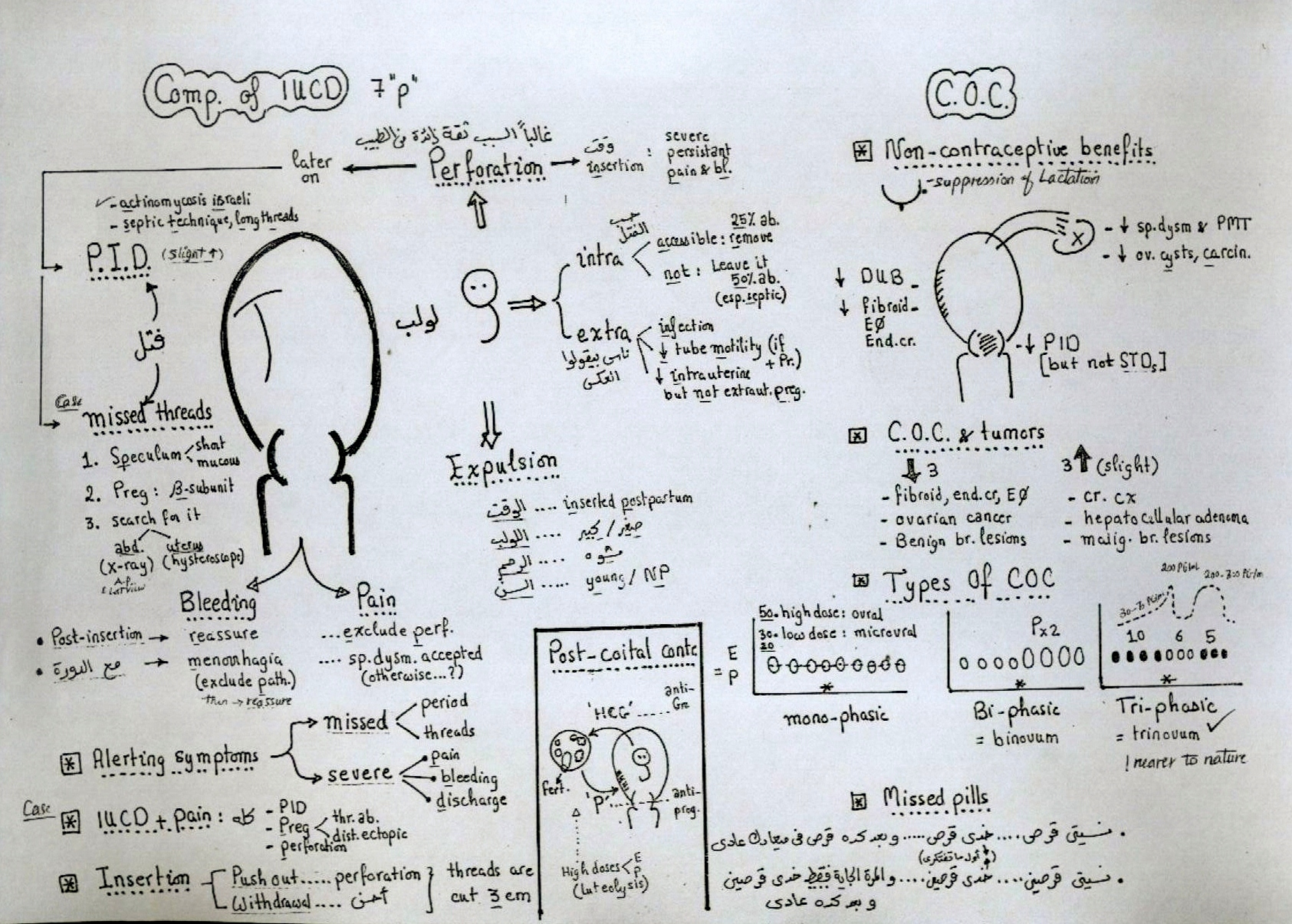
	Parentral		Oral
A	2g IV/6hr cefoxitin / 2g IV/12hr cefotetan (2nd G.) or ampicillin / sulbactam 3g IV/6hrs	⊕	Levofloxacin 500 → 1×1×14 or Ofloxacin 400 → 1×2×14
	⊕ 100 mg IV/12 hr →		Doxycline 100 ⊕ Metronidazole 500
B	clindamycin 900 mg IV/8hrs ⊕ gentamycin 2mg/kg then → 1.5mg/kg/8hrs	⊕	Ceftriaxone 250 (3rd G.) or cefoxitin 2gm (2nd G.) ⊕ Probenecid — IM once

※ < 18y, preg.

⊕ ttt of specific org.

Cases of Acute P.I.D → Hospitilizatn
1. Young age (→ Chr. → Infertility)
2. Low parity
3. Large T.O Complex mass
4. Ruptured T.O. Complex mass

D.D. of Cervical Motion Tenderness
- Ectopic
- P.I.D



Comp. of IUCD 7"p"
غالباً السبب ثقة زائدة من الطبيب
later on
Perforation
وقت insertion : severe persistant pain & bl.
- actinomycosis israeli
- septic technique, long threads
P.I.D. (slight ↑)
قتل
missed threads
1. Speculum < short / mucous
2. Preg : β-subunit
3. search for it
abd. (x-ray) uterus (hysteroscope)
لولب
intra < accessible : remove 25% ab. / not : Leave it 50% ab. (esp. septic)
extra < infection / ↓ tube motility (if + Pr.) / ↓ intrauterine but not extraut. preg.
ناس بيقولوا العكس
Expulsion
الوقت .... inserted postpartum
اللولب .... صغير / كبير
الرحم .... مشوه
السن .... young / NP
Bleeding
• Post-insertion → reassure
• مع الدورة → menorrhagia (exclude path.) then → reassure
Pain
... exclude perf.
... sp. dysm. accepted (otherwise ...?)
Alerting symptoms
missed < period / threads
severe < pain / bleeding / discharge
Case
IUCD + pain : كله - PID - Preg < thr. ab. / dist. ectopic - perforation
Insertion [Push out ..... perforation / Withdrawal .... صح] threads are cut 3 cm
Post-coital contr.
'HCG' ..... anti-Gn
fert.
'P' ..... anti-prog.
High doses < E / P (luteolysis)
C.O.C.
Non-contraceptive benefits
- suppression of Lactation
- ↓ sp. dysm & PMT
- ↓ ov. cysts, carcin.
↓ DUB
↓ fibroid
EØ
End. cr.
↓ PID [but not STDs]
C.O.C. & tumors
↓ 3
- fibroid, end. cr, EØ
- ovarian cancer
- Benign br. lesions
3 ↑ (slight)
- cr. cx
- hepatocellular adenoma
- malig. br. lesions
Types of COC
E = P
50. high dose : ovral
30. low dose : microval
mono-phasic
Px2
Bi-phasic = binovum
10 6 5
Tri-phasic = trinovum ✓ nearer to nature
Missed pills
• نسيت قرص .... خدي قرص ..... وبعد كده قرص في معادك عادي
• نسيت قرصين ... خدي قرصين .... والمرة الجاية فقط خدي قرصين وبعد كده عادي

Row labels: Types · Mech. of action · F.R. "Pearl index" /HWY · Adv. · Disadv.

Natural — Physiolog.

Safe period
- * Calender
- * BBT
- * cx-mucous

Lactational amenorrhea

efficacy is ↑ed to 90% by
- * Amenorrhea
- * Reg. feeding
- * no extra-food

Bleeding ...

Coitus int. / int.

No medical contraind.

1. high F.R. 15-30/HWY
2. limitation of I.C.
3. needs motivated couples
4. safe period reg. cycles

Mech. & chemical

(condom) 15 x 3.5 / 0.02-0.07

non cont. benef.
- * ↓ STD
- * ... of immun.
- * semen collecti.

Vag. diaph.

Disadv. for all
- F.R. 3-14/HWY
- Allergy
- Difficult use
- Better combined with chemical
- Diaph → cystitis

cx. cap

cervical cap → for those with vag. prolapse

Toxic shock — day 24 hrs

⊕ **Spermicidals**

Nono-/Octo- -oxynol 9
- → 15 min < IC
- → IC within 2 hrs
- → No douch 6 hrs

F.R. 30/HWY

IUCD

Inert ↓
1. Aseptic endomet.
2. ↑ PG

e.g. Lippes loop

Medicated → Cu ± Ag ; Prog (IUS)

Cu ± Ag ↓ ضد
- * sperm
- * endomet
- * zygote
- → CuT380A
- → Multiload

Prog (IUS) ↓ as in POP
- * Progestasert
- * mirena (levonorgestrel)

F.R.: 1-2 (Cu) ; 0.2 (Prog)

- . cheap
- . long use
- . reversible

No local (I.C) / syst effects

- . DUB
- . end. hyper
- . ↓ PID

Not in: [Wilson]; anatomy; Bleeding; PID, ectopic; RhD, DM; amen. / bl. ⊕ undiagnosed

PID; 1. perforation; 2. intra / extra; 3. ↓ expulsion; 1 2 3 ↓ missed threads; Bl. ← → Pain

1. What are alerting symptoms
2. D.D. of pain + IUCD
3. How to insert an IUCD.

C.O.C.

E. used → E.E. (mestranol ×)

P. → 1st → estrane: Norethindr, Norethisterone, Norgestrel; pregnane: MPA
→ 2nd ..... Levonorgestrel
→ 3rd ..... Marvelon, gynera, cilest

Monophasic (- high dose, - low dose) · Biphasic · Triphasic

P. / E. — 0.1/HWY; ↓ PID; Bl. ← → Pain

Side effect	Contraind.
P.: Headache, mood ch.	Migraine, epilepsy
E.: engorg.	lactation, * Br. mass
E.: thromb.	* DVT
P.: Atherosc., HTN	hypert., smoker, thyrotoxic
N&V. ↑ org.	
E. ⊕ cholestasis & gall stones	* acute VH, chr. Liver
I.R. (E ± P)	DM
P. weight gain	
↓ hypomen., amenorrhea; ↑ spotting, B.T.B.	undiagn. BL, amen., Pregnancy

* Relation of C.O.C. to tumors.
* How to manage missed pill.

P.O.P.

(Minipill)
- Micronor 300ug (Norethisterone)
- Microlut 30ug (Levonorgestrel) ✓
- Exluton (lynestrenol)

Ⓟ only
- . Taken daily
- . not delayed

used in

{main mech. is by: thick mucus}

- lactating
- CVS < old / smoker
- E. contraind.
- Liver
- DM ± HTN
- obese

Disadv.
- . 1-2 /HWY
- . more ectopic
- . more spotting

Injectable

3m — DMPA 150 mg

2m — Norethisterone enanthate 200 mg

1m — Cyclofem, Mesygyna

E. was added to ↓ menst. side effects

as C.O.C. 99%

used in
- lactating ✓
- + non-contr. benefits as in C.O.C.
- E. contraind. ✓
- DM ± HTN / obese ×] تقيلة

Disadv.
1. not readily reversible
2. ↓ BMD rev.
3. more menst. irreg. esp amenorrhea

/2m or /1m.

Surgical

♂ **bil. vasectomy**
- under Local anesth.
- wait for 70 days till 2-ve semen analysis

♀ **sterilization**
- . Laparoscopy
- . Laparot. (Pomeroy)
- . Postpartum → C.S. ✓ ; → V.D. ×

indication

Permanent → social: . >35 yrs, . failed other methods; medical: . v. weak scar, . serious illness

contra-indic.

Young uncertain couple with marrital / mental probl.

Disadv.
1. Gyna — Post-tubal ligation S.
2. Obst — 0.1-0.4: - faulty tech, - recanaliz., - was preg.

Emerg.

Mech.
- IUCD
- Menst. aspiration

Hormones

(morning after) pill; anti-emetic

1] estrogen
- EE 2 mg
- CEE 20 mg

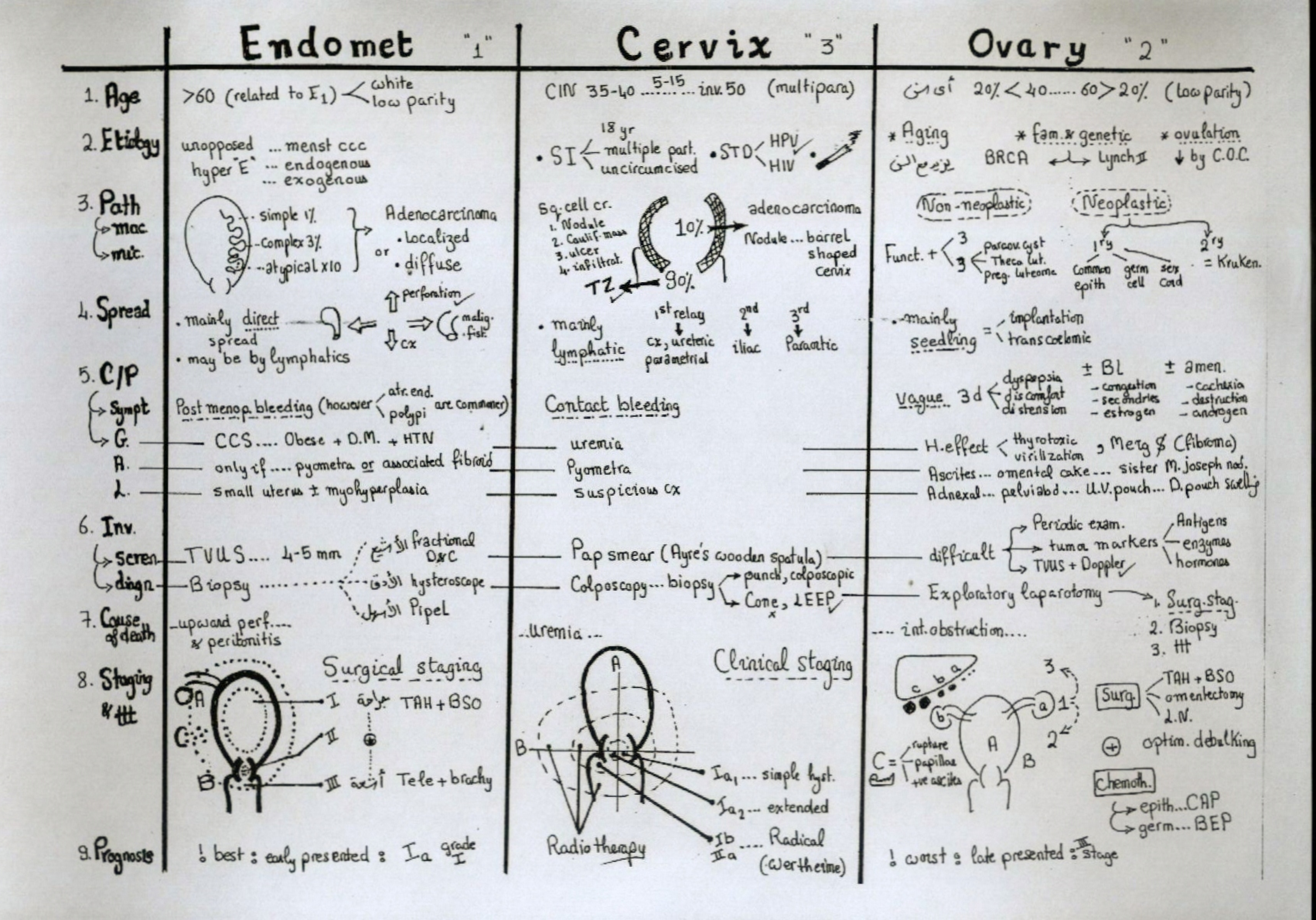
2] POP 750 ug (postinor)

3] COC ✓ — ovral 2 tab. يكرر بعد ١٢ ساعة

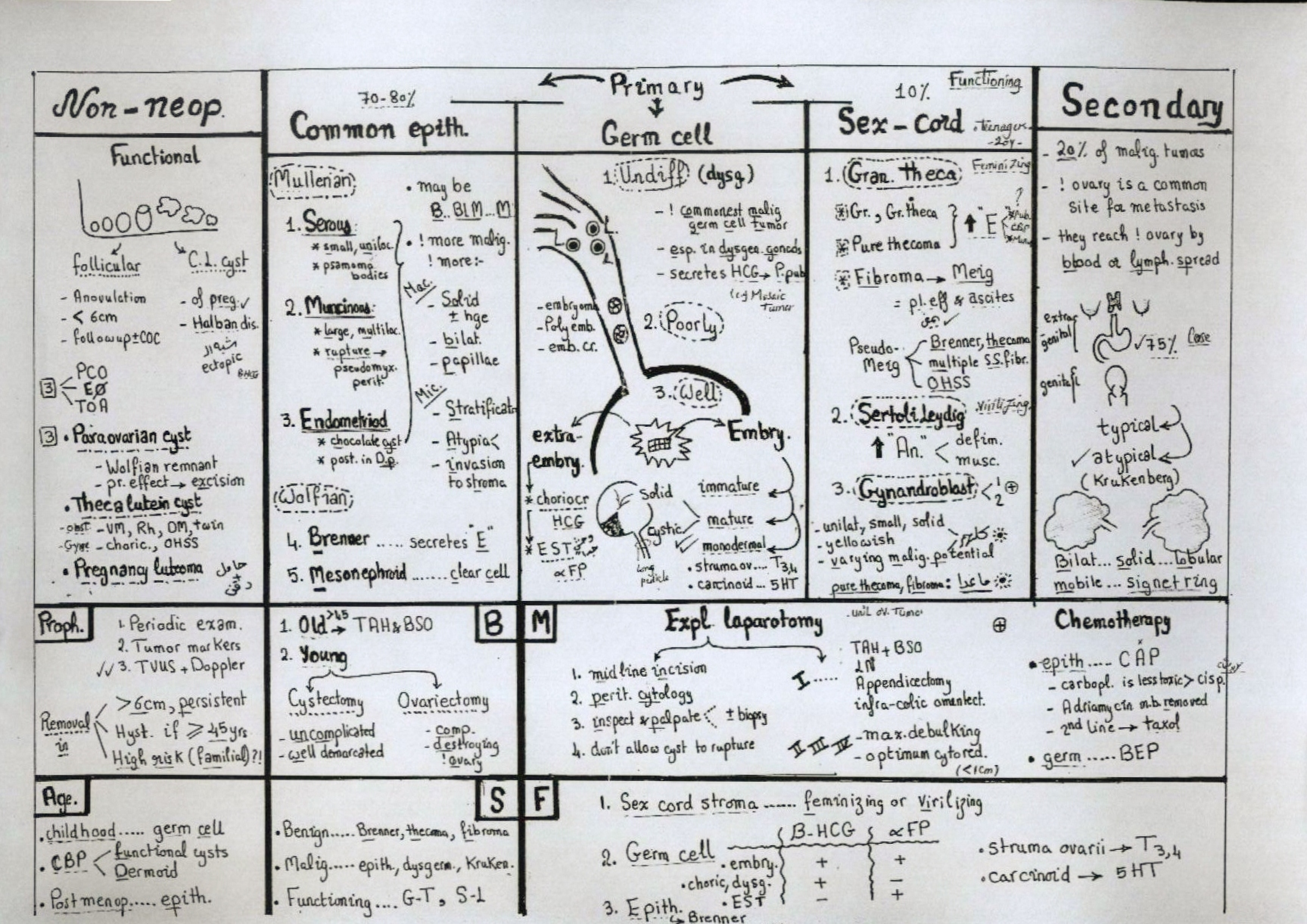
4] Anti-Gn — danazol

5] Anti-Prog — mifepristone

Post-partum c.
- . Br. feeding
- . Barriers
- . IUCD
- . Prog. only contracept.
- . Sterilization

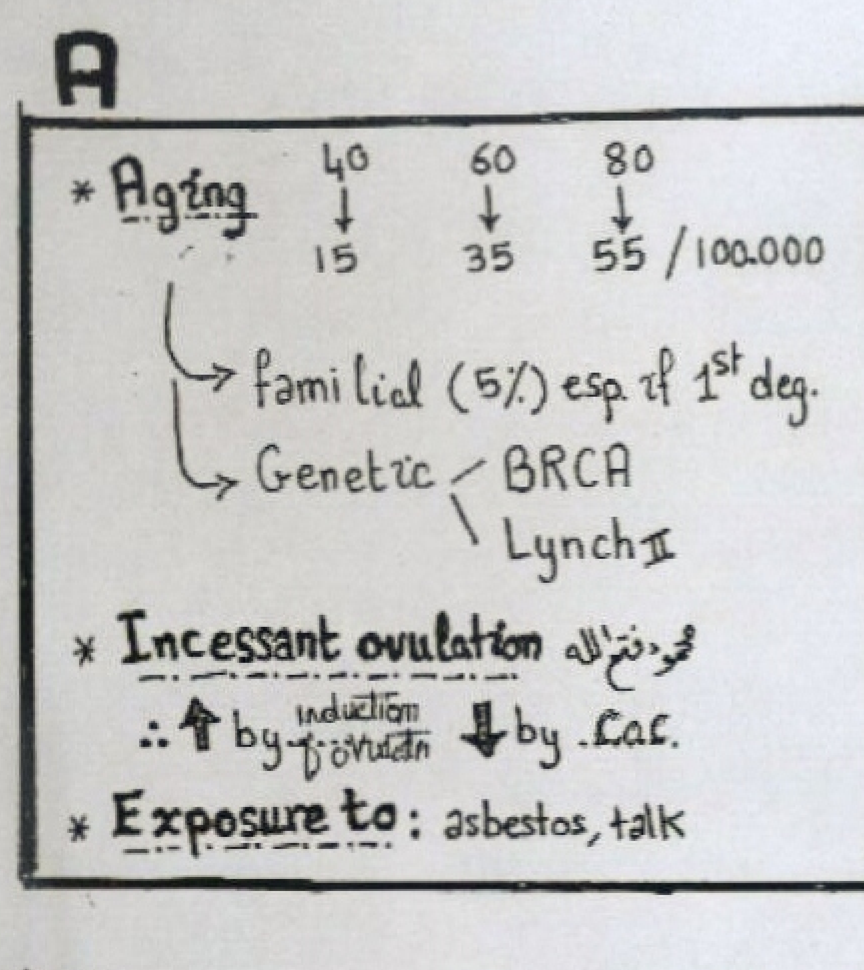


	Endomet "1"	Cervix "3"	Ovary "2"
1. Age	>60 (related to E_1) < white / low parity	CIN 35-40 ...5-15... inv. 50 (multipara)	أي سن 20% < 40 ...... 60 > 20% (low parity)
2. Etiology	unopposed hyper "E" ... menst ccc / ... endogenous / ... exogenous	• SI < 18 yr / multiple part. / uncircumcised • STD < HPV ✓ / HIV •	* Aging يزيد مع السن * fam. & genetic BRCA ↔ Lynch II * ovulation ↓ by C.O.C.
3. Path ↳ mac ↳ mic	simple 1% / complex 3% / atypical x10 } → Adenocarcinoma or • localized • diffuse	Sq. cell cr. 1. Nodule 2. Caulif. mass 3. ulcer 4. infiltrat. — 10% → adenocarcinoma Nodule ... barrel shaped cervix — TZ ← 90%	Non-neoplastic: Funct. + < 3 / 3 < Paraov. cyst, Theca lut., Preg. luteoma — Neoplastic: 1ry (common epith, germ cell, sex cord); 2ry = Kruken.
4. Spread	• mainly direct spread ⇐ ⇑ perforation ✓ ⇓ cx ⇒ malig. fist. • may be by lymphatics	• mainly lymphatic: 1st relay ↓ cx, ureteric parametrial; 2nd ↓ iliac; 3rd ↓ Paraaortic	• mainly seedling = implantation / transcoelomic
5. C/P ↳ Sympt	Post menop. bleeding (however < atr. end. / polypi are commoner)	Contact bleeding	Vague 3d < dyspepsia / discomfort / distension; ± BL - congestion - secondries - estrogen; ± amen. - cachexia - destruction - androgen
↳ G.	CCS .... Obese + D.M. + HTN	uremia	H. effect < thyrotoxic / virilization, Meig's (fibroma)
A.	only if .... pyometra or associated fibroid	Pyometra	Ascites ... omental cake ... sister M. joseph nod.
L.	small uterus ± myohyperplasia	suspicious cx	Adnexal ... pelviabd ... U.V. pouch ... D. pouch swelling
6. Inv. ↳ screen	TVUS .... 4-5 mm	Pap smear (Ayre's wooden spatula)	difficult → Periodic exam. / tumor markers < Antigens, enzymes, hormones / TVUS + Doppler ✓
↳ diagn	Biopsy ...... الأشيع fractional D&C / الأدق hysteroscope / الأسهل Pipel	Colposcopy ... biopsy < punch, colposcopic / Cone, LEEP ✓	Exploratory laparotomy → 1. Surg. stag. 2. Biopsy 3. ttt
7. Cause of death	upward perf.... & peritonitis	..uremia..	.... int. obstruction....
8. Staging & ttt	Surgical staging: A, B, C; I عملية TAH + BSO; II ⊕; III أشعة Tele + brachy	Clinical staging: A, B; Ia1 ... simple hyst.; Ia2 ... extended; Ib IIa .... Radical (Wertheime); Radiotherapy	a, b, c; 1, 2, 3; A, B; C = rupture / papillae / +ve ascitis; Surg. < TAH + BSO / omentectomy / L.N.; ⊕ optim. debulking; Chemoth. → epith...CAP / germ... BEP
9. Prognosis	! best : early presented : Ia grade I		! worst : late presented : III stage



Non-neop.
Functional
follicular
C.L. cyst
- Anovulation
- < 6cm
- followup ± COC
- of preg.
- Halban dis.
ectopic
PCO
EØ
TOA
Paraovarian cyst
- Wolfian remnant
- pr. effect → excision
Theca lutein cyst
- obst - VM, Rh, DM, twin
- Gyne - choric., OHSS
Pregnancy luteoma
Primary
70-80%
Common epith.
Mullerian
1. Serous
* small, uniloc.
* psamoma bodies
2. Mucinous
* large, multiloc.
* rupture → pseudomyx. perit.
3. Endometriod
* chocolate cyst
* post. in D.p.
Wolfian
4. Brenner ..... secretes "E"
5. Mesonephroid .... clear cell
may be B. BLM ... M
! more malig.
! more:-
Mac.
- Solid ± hge
- bilat.
- papillae
Mic.
- Stratificat.
- Atypia
- invasion to stroma
Germ cell
1. Undiff (dysg.)
- ! commonest malig germ cell tumor
- esp. in dysgen. gonads
- secretes HCG → P.pub
2. Poorly
3. Well
- embryom.
- Poly emb.
- emb. cr.
extra-embry.
* choriocr
HCG
* EST
αFP
Embry.
Solid
cystic
immature
mature
monodermal
long pedicle
- struma ov.... $T_{3,4}$
- carcinoid ... 5HT
10%
Functioning
Sex-cord
teenagers -25y-
Feminizing
1. Gran. theca
Gr., Gr. theca
Pure thecoma
↑ "E"
Fibroma → Meig
= pl. eff & ascites
Pseudo-Meig
Brenner, thecoma
multiple S.S. fibr.
OHSS
Virilizing
2. Sertoli Leydig
↑ "An." < defim. musc.
3. Gynandroblast < 1/2 ⊕
- unilat, small, solid
- yellowish
- varying malig. potential
pure thecoma, fibroma:
Secondary
- 20% of malig. tumors
- ! ovary is a common site for metastasis
- they reach ! ovary by blood or lymph. spread
extra genital
genital
75% case
typical
atypical (Krukenberg)
Bilat... solid... lobular
mobile ... signet ring
Proph.
1. Periodic exam.
2. Tumor markers
3. TVUS + Doppler
Removal in
> 6cm, persistent
Hyst. if ≥ 45yrs
High risk (familial)?!
B
1. Old >45 → TAH & BSO
2. Young
Cystectomy
- uncomplicated
- well demarcated
Ovariectomy
- comp.
- destroying ! ovary
M
Expl. laparotomy
1. midline incision
2. perit. cytology
3. inspect & palpate ± biopsy
4. don't allow cyst to rupture
I .....
TAH + BSO
LN
Appendicectomy
infra-colic omentect.
II III IV
- max. debulking
- optimum cytored. (< 1cm)
Chemotherapy
epith .... CAP
- carbopl. is less toxic > cisp.
- Adriamycin m.b. removed
- 2nd line → taxol
germ ..... BEP
Age.
childhood ..... germ cell
CBP < functional cysts, Dermoid
Post menop. ..... epith.
S
Benign ..... Brenner, thecoma, fibroma
Malig. ..... epith., dysgerm., Kruken.
Functioning .... G-T, S-L
F
1. Sex cord stroma ...... feminizing or Virilizing
2. Germ cell
β-HCG
αFP
embry. + +
choric, dysg. + −
EST − +
3. Epith. → Brenner
struma ovarii → $T_{3,4}$
carcinoid → 5HT

A



* Aging
  - 40 → 15, 60 → 35, 80 → 55 /100.000
  - → familial (5%) esp. if 1st deg.
  - → Genetic: BRCA, Lynch II
* Incessant ovulation محوديتى الله
  - ∴ ↑ by induction of ovulation, ↓ by C.O.C.
* Exposure to: asbestos, talk

General

* H. effect → str. ovarii; → ~~Carcinoid~~ Virilizatn
* Pl. effusion (Meig S) — 4B M / B
* Cachexia

Abd

* enlarged liver or Kid.
* Ascites, omental cake
* Sister M. Joseph

Local

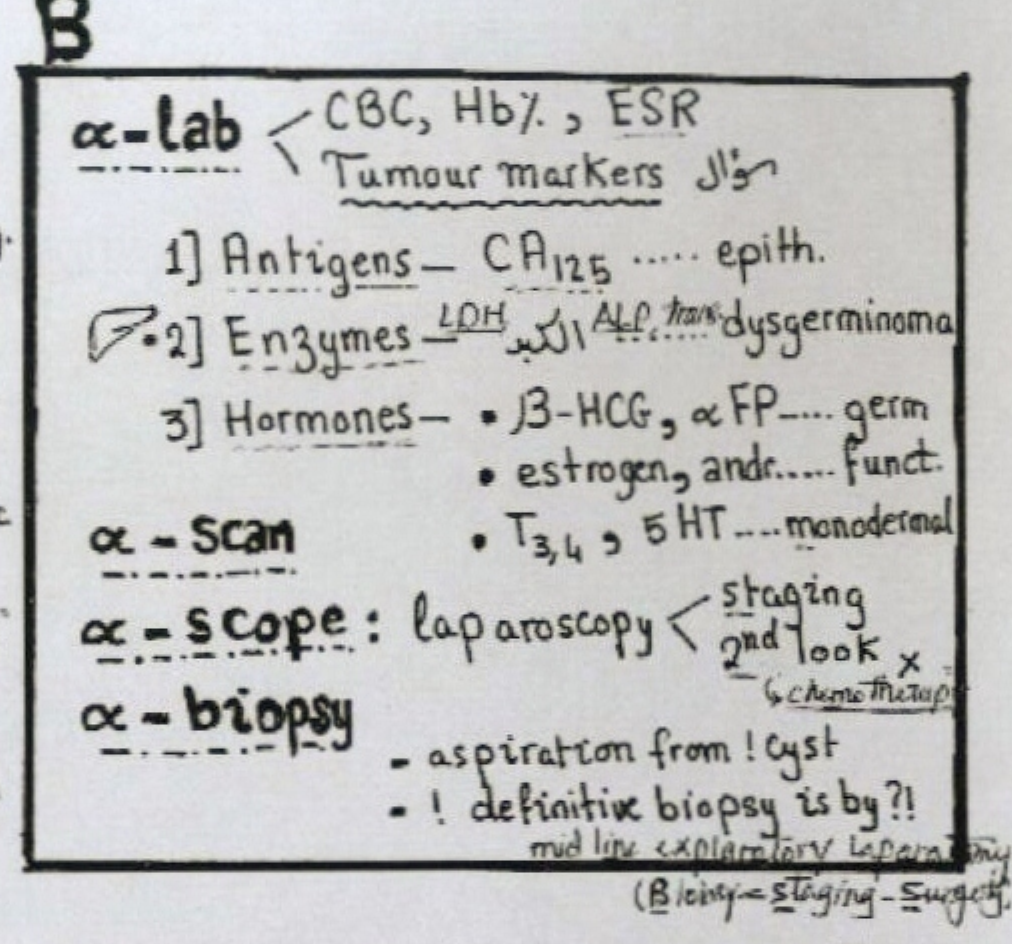
* Mass
  - Pelvi-abd
  - adnexal
  - D. pouch ..... dermoid
  - U.V pouch ..... Endometrid
* Nodules

Symptoms

Symptoms: Vague; presented late (3rd stage)

1. Swelling ↓ Presented as 3d: • Distension • Dyspepsia • Discomfort
2. Bleeding
   - → p. cong.
   - → 2ries to ut.
   - → functioning (Est.)
   - OR → Amenorrhea
     - → cachexia
     - → bilat. destructive
3. Pain if comp.
4. Disch ذكرك

B



* α - lab: CBC, Hb%, ESR; Tumour markers أهم
  1] Antigens — CA_{125} ..... epith.
  2] Enzymes — LDH الكبد ALP, trans. dysgerminoma
  3] Hormones —
     - β-HCG, αFP ..... germ
     - estrogen, andr. ..... funct.
     - $T_{3,4}$, 5 HT ..... monodermal
* α - scan
* α - scope: laparoscopy — staging; 2nd look (after chemotherapy)
* α - biopsy
  - aspiration from ! cyst ✗
  - ! definitive biopsy is by ?! mid line exploratory laparotomy (Biopsy - staging - Surgery)

C

(written)

! most Common → Dermoid (long pedicle)

acute abdomen ← ALL → laparotomy

T
- acute: gangrene } adnexectomy but
- chronic: parasitic } don't untwist ! pedicle → DIC

R
- Papillary: spread of papillae (ascites)
- mucinous: P. myxoma perit.
- dermoid: chem. peritonitis
- → infected, hgic, malig. } spread

H → acute abd. ⊕ shock ⊕ rapid ↑ in size

I
- infection: antibiotics ⊕ deroofing
- incarceration: impaction in ! pelvis → pr. ...

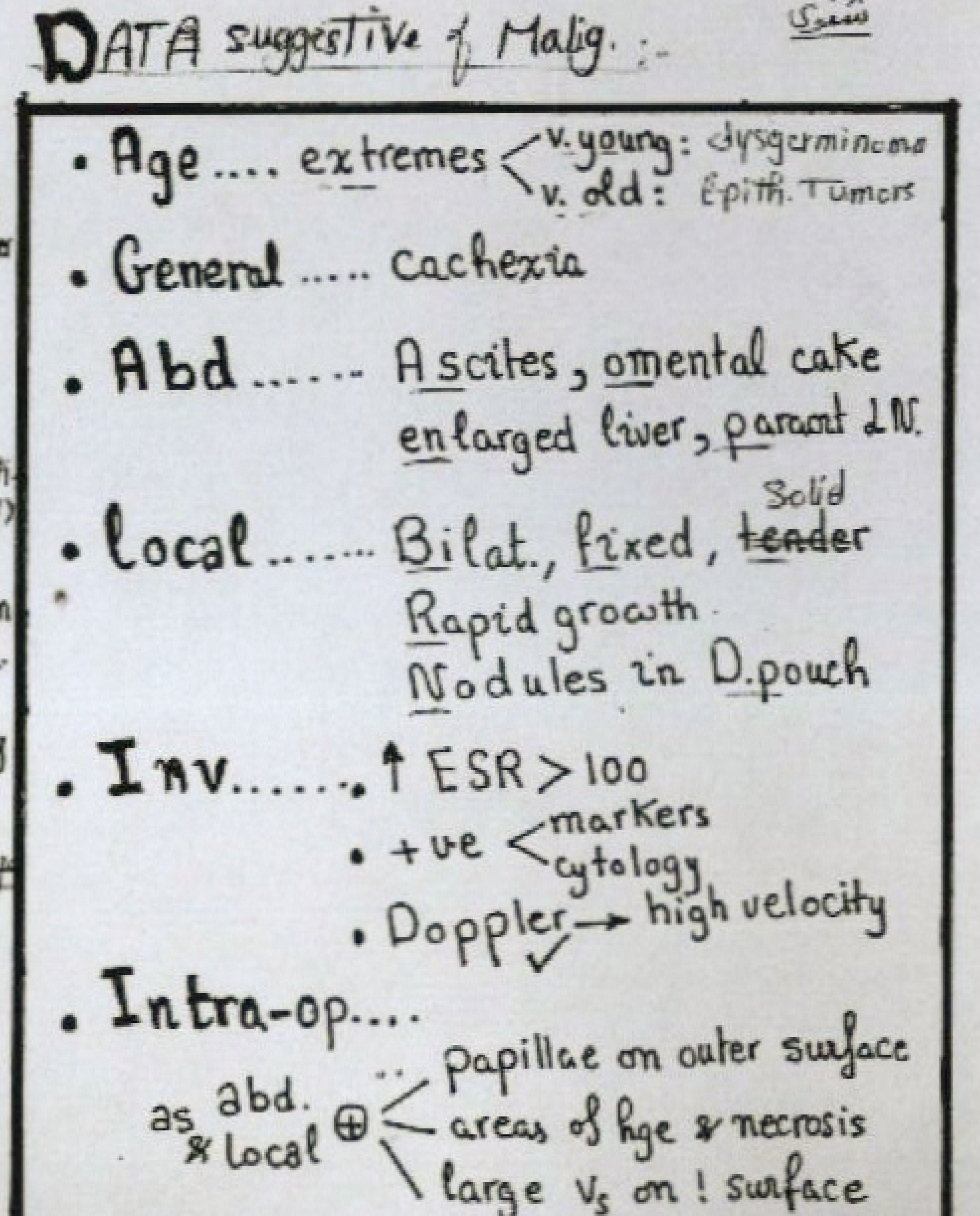
Malig. ?! شوف (Data suggestive of malig)

Pressure manif.

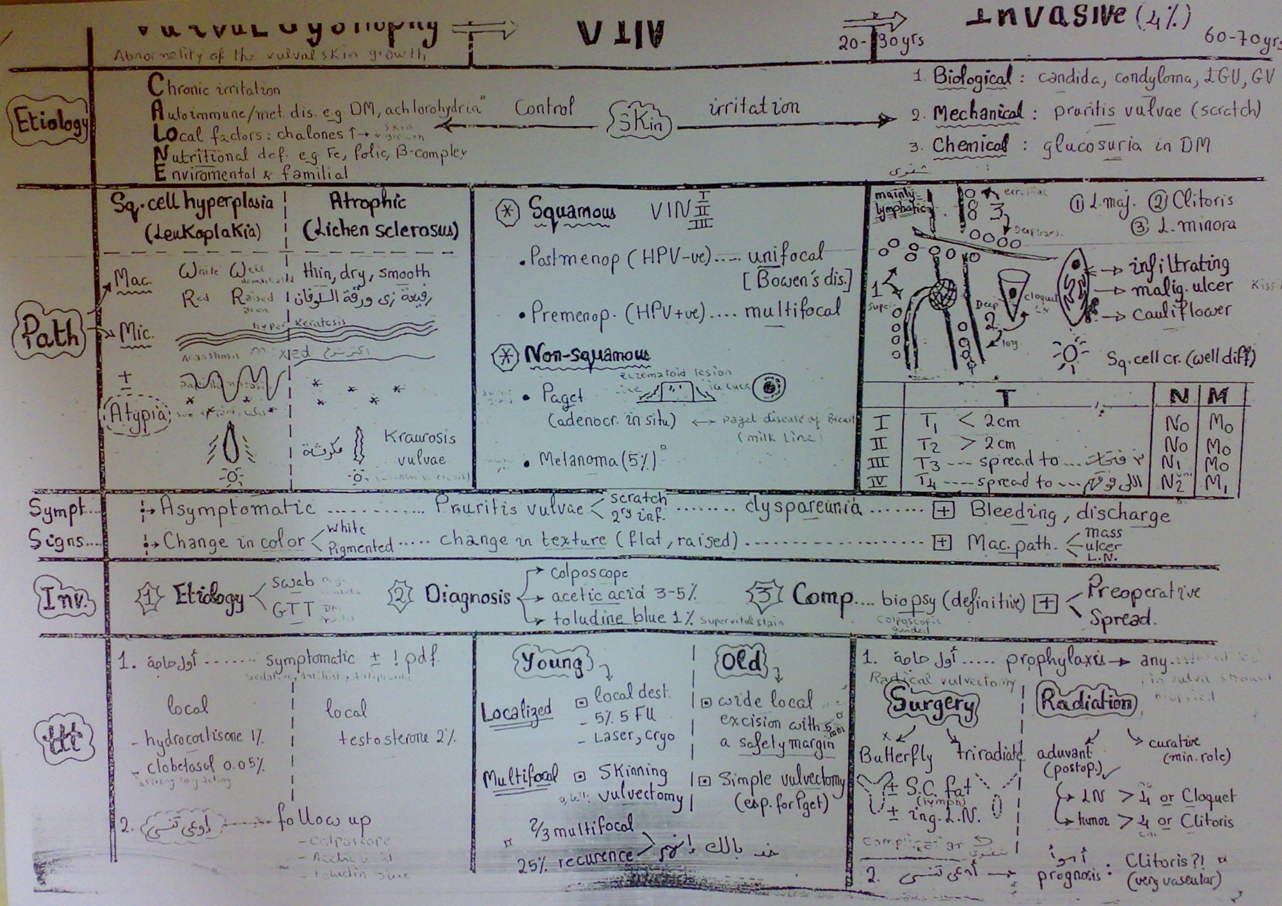
Pregnancy :- أشهر حاجة مع الحمل ال dermoid
- → 1st trim ..... may be C.I. of preg. (esp. if < 6 cm)
- → 2nd ..... Laparotomy (esp. if > 6-8 cm)
- → 3rd ..... technical difficulty
- → labor .... VD if no obst: laparotomy within a week

DATA suggestive of Malig.

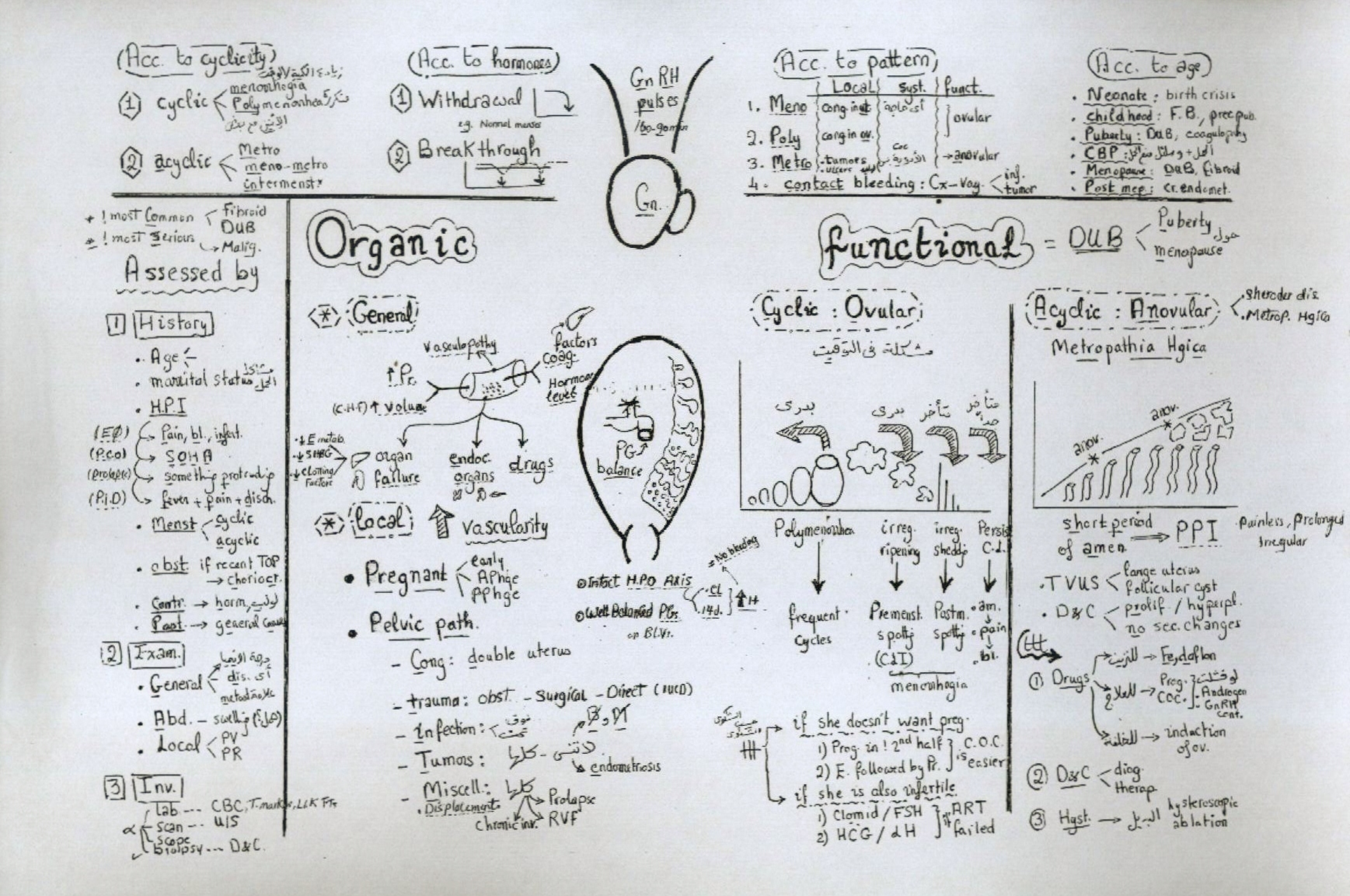
شوف



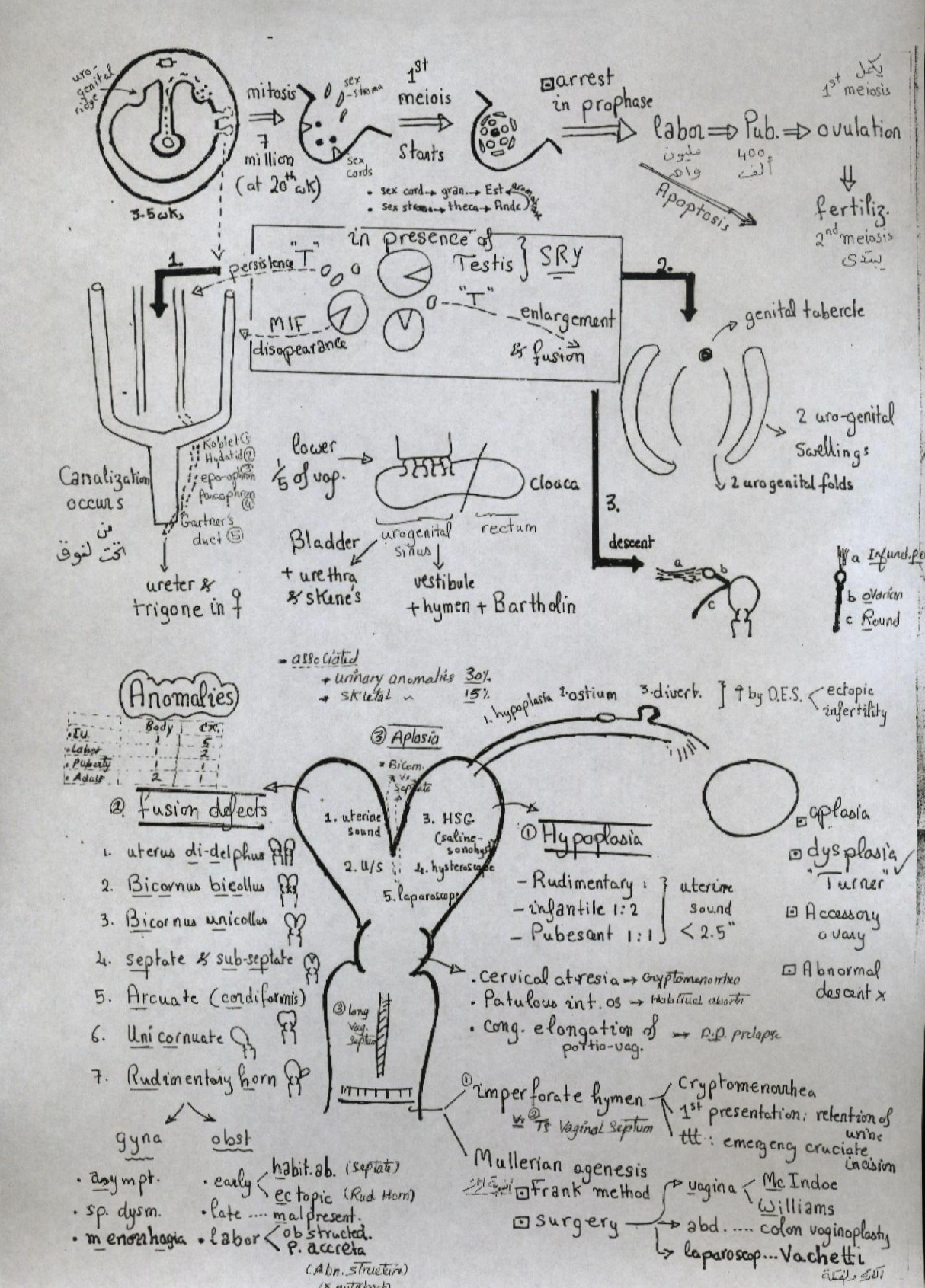
* Age .... extremes — v. young: dysgerminoma; v. old: Epith. Tumors
* General ..... cachexia
* Abd ...... Ascites, omental cake, enlarged liver, paraaort LN.
* local ...... Bilat., fixed, ~~tender~~ Solid; Rapid growth; Nodules in D. pouch
* Inv. ...... ↑ ESR > 100
  - +ve: markers, cytology
  - Doppler → high velocity
* Intra-op ....
  - as abd. & local ⊕
    - papillae on outer surface
    - areas of hge & necrosis
    - large Vs on ! surface



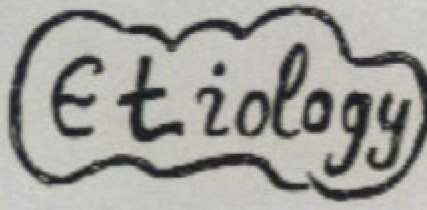
Abnormality of the vulval skin growth
VIN
20-30 yrs
Invasive (4%)
60-70 yrs
Etiology
Chronic irritation
Autoimmune/met. dis. eg DM, achlorohydria
Local factors: chalones
Nutritional def. eg Fe, folic, B-complex
Enviromental & familial
Control
Skin
irritation
1. Biological : candida, condyloma, LGU, GV
2. Mechanical : pruritis vulvae (scratch)
3. Chemical : glucosuria in DM
Path
Sq. cell hyperplasia (Leukoplakia)
Atrophic (Lichen sclerosus)
Mac.
White Well demarcated
Red Raised
thin, dry, smooth
رفيعة زى ورقة السولفان
Mic.
hyper keratosis
Acanthosis
Atypia
Kraurosis vulvae
مكرمشة
Squamous VIN I II III
• Postmenop (HPV-ve) .... unifocal [Bowen's dis.]
• Premenop. (HPV+ve) .... multifocal
Non-squamous
• Paget (adenocr. in situ)
eczematoid lesion
Paget disease of Breast (milk line)
• Melanoma (5%)
mainly lymphatics
1. L. maj. 2. Clitoris 3. L. minora
infiltrating
malig. ulcer
cauliflower
Super.
Deep
Cloquet
Sq. cell cr. (well diff)
T | N | M
I T1 < 2cm N0 M0
II T2 > 2cm N0 M0
III T3 --- spread to ... N1 M0
IV T4 --- spread to ... N2 M1
Sympt.... Asymptomatic .... Pruritis vulvae < scratch, 2ry inf. .... dyspareunia .... + Bleeding, discharge
Signs.... Change in color < white, Pigmented ..... change in texture (flat, raised) .... + Mac. path. < mass, ulcer, L.N.
Inv.
1. Etiology < Swab, GTT
2. Diagnosis: colposcope, acetic acid 3-5%, toludine blue 1% supervital stain
3. Comp.... biopsy (definitive) colposcopic guided + < Preoperative, Spread.
tt
1. أول حاجة .... symptomatic ± ! pdf.
local
- hydrocortisone 1%
- clobetasol 0.05%
local
testosterone 2%
2. أوعى تنسى .... follow up
- Colposcope
- Acetic acid
- toludin blue
Young
Localized: local dest. - 5% 5 FU - Laser, cryo
Multifocal: Skinning vulvectomy
Old
wide local excision with 5 mm a safety margin
Simple vulvectomy (esp. for Paget)
2/3 multifocal
25% recurrence
خد بالك أوعى
1. أول حاجة ..... prophylaxis → any
Radical vulvectomy
Surgery
Butterfly
triradiate
± S.C. fat (lymph)
± ing. L.N.
Radiation
adjuvant (postop.)
curative (min. role)
LN > 4 or Cloquet
tumor > 4 or Clitoris
2. أوعى تنسى
prognosis : Clitoris?! (very vascular)



(Acc. to cyclicity)
1 cyclic menorrhagia
Polymenorrhea
2 acyclic Metro
meno-metro
intermenstr
(Acc. to hormones)
1 Withdrawal
eg. Normal menses
2 Breakthrough
GnRH pulses
Gn.
(Acc. to pattern)
Local
Syst.
funct.
1. Meno
2. Poly
3. Metro
4. contact bleeding : Cx-Vag.
inf.
tumor
ovular
anovular
(Acc. to age)
Neonate : birth crisis
childhood : F.B., precpub.
Puberty : DUB, coagulopathy
Menopause : DUB, fibroid
Post mep : cr. endomet.
most Common Fibroid
DUB
most Serious Malig.
Assessed by
1 History
Age
marital status
H.P.I
Pain, bl., infert.
SOHA
something protruding
fever + pain + disch.
Menst cyclic
acyclic
obst if recent TOP
chorioca.
Contr. horm.
Past general
2 Exam.
General
Abd. swelling
Local PV
PR
3 Inv.
Lab CBC
Scan U/S
Scope
biopsy D&C.
Organic
General
Vasculopathy
factors
coag.
Hormone level
volume
organ failure
endoc. organs
drugs
Local
vascularity
Pregnant early APhge PPhge
Pelvic path.
Cong: double uterus
trauma: obst. - surgical - Direct (IUCD)
Infection:
Tumors:
endometriosis
Miscell.:
Displacement
Prolapse
Chronic inv.
RVF
PG balance
Intact H.P.O Axis
Well Balanced PGs.
No bleeding
functional = DUB
Puberty
menopause
Cyclic : Ovular
Polymenorrhea
irreg. ripening
irreg. shedding
Persis C.L.
frequent Cycles
Premenst. spotting
(C.L.I)
Postm. spotting
am.
pain
bl.
menorrhagia
if she doesn't want preg.
1) Prog. in 2nd half
2) E. followed by Pr.
C.O.C. is easier
if she is also infertile
1) Clomid / FSH
2) HCG / LH
ART if failed
Acyclic : Anovular
Metropathia Hgica
anov.
short period of amen.
PPI
Painless, Prolonged
Irregular
TVUS large uterus
follicular cyst
D&C prolif / hyperpl.
no sec. changes
1 Drugs
Prog.
COC.
Androgen
GnRH
induction of ov.
2 D&C diag.
therap.
3 Hyst.
hysteroscopic ablation



uro-genital ridge
3-5 wks
mitosis
7 million (at 20th wk)
sex stroma
sex cords
1st meiois starts
arrest in prophase
labor ⇒ Pub. ⇒ ovulation
مليون واحد
400 ألف
Apoptosis
1st meiosis يكمل
fertiliz.
2nd meiosis يبتدى
• sex cord → gran. → Est
• sex stroma → theca → Andr
in presence of Testis } SRY
1.
persistence "T"
MIF disapearance
"T" enlargement & fusion
2.
genital tubercle
2 uro-genital swellings
2 urogenital folds
3.
descent
a Infund.pel
b ovarian
c Round
Koblet ①
Hydatid ②
epo-ophron
paroophron ④
Gartner's duct ⑤
Canalization occurs من تحت لفوق
ureter & trigone in ♀
lower 1/5 of vag.
Cloaca
urogenital sinus
rectum
Bladder + urethra & skene's
vestibule + hymen + Bartholin
- associated
+ urinary anomalies 30%
+ skeletal 15%
Anomalies
Body | Cx.
IU | 1 | 5
Labor | 1 | 2
Puberty | 1 | 1
Adult | 2 | 1
1. hypoplasia 2. ostium 3. divert.] ↑ by D.E.S. < ectopic, infertility
③ Aplasia
* Bicorn. Vs Septate
1. uterine sound
2. U/S
3. HSG (saline-sonohyst)
4. hysteroscope
5. laparoscope
② fusion defects
1. uterus di-delphus
2. Bicornus bicollus
3. Bicornus unicollus
4. septate & sub-septate
5. Arcuate (cordiformis)
6. Unicornuate
7. Rudimentary horn
gyna
• asympt.
• sp. dysm.
• menorrhagia
obst
• early < habit.ab. (septate), ectopic (Rud Horn)
• late .... malpresent.
• labor < obstructed., P. accreta
(Abn. structure)
① Hypoplasia
- Rudimentary :
- infantile 1:2
- Pubesent 1:1
uterine sound < 2.5"
③ long vag. septum
. cervical atresia → Cryptomenorrhea
. Patulous int. os → Habitual abortion
. cong. elongation of portio-vag. → P.D. prolapse
① imperforate hymen
Vs ② Ts Vaginal Septum
Cryptomenorrhea
1st presentation: retention of urine
ttt: emergency cruciate incision
Mullerian agenesis
Frank method
surgery
vagina < Mc Indoe, Williams
abd. .... colon vaginoplasty
laparoscop... Vachetti
aplasia
dysplasia "Turner"
Accessory ovary
Abnormal descent x



unopposed Hyper-estrogen.

(*) Epidemiology
- Age: hyperpl. 40y / Cr. 60y
- Race: white
- Class: High

(*) Etiology
- Menst. ccc
- Endogenous (PCO, E sec. ov. tumors, E sec. ov. tum, PCO)
- Exogenous ERT

(*) Association "CCS"
- Obesity
- D.M.
- HTN

C/P

short period amen. → bleeding

Peri-menop. bl.

Post-menop. bl.

1. Bleeding
   - any P.M. bl. → End. cr. :إيه القاعدة
   - atroph End.: common :مين الـ
   - Sources E: إمتى فى سن صغيرة
2. Pain
   - Rare & late :إيه القاعدة
   - إمتى يبقى فيه وجع:
   - Visceral / Somatic spread
   - Pyometra
3. Discharge
   - Leucorrhea
   - M.P. discharge
4. Swelling
   - إمتى الرحم يكبر
   - Pyometra
   - ass. Fibroid

Exam.

- G.: Cachexia, تشوهات CCS
- A.: $ wax
- L.: PV, PR, الإتنين

Path.

large ⇧ إمتى ⇧ die

- Prolif. endom.
- Cystic gl. hyper. ... 1% → Simple
- ± atypia ... 10%
- Adenomat. hyper ... 3% → Complex
- ± atypia ... 30% → Atypical
- Adenocarcinoma
- Adeno-acanthoma
- Adeno-sq.-cr
- Pure sq. cr.
- Carcinosarcoma

End. a < ½ m, b, c > ½

I, II (a glands, b stroma), III A, III B, III C (L.N.)

endomet. / cx — fract. D & C

إمتى ندى الـ inguinal?!

TV.U/S 4-5 mm

1. Screening
2. Diagnostic
   - Pipelle - إيه البديل فى العيادة
   - Hysterosc. - إيه أدق حاجة
3. Preop.
   - HB%
   - ECG, سكر
   - CXR
4. Staging
   - radiology
   - endoscopy

4/5, 1/5

إيه أخبار الـ prognosis ☺

ttt

(x) Etiology

(*) Prophylaxis
- screen by TVUS
- D & C for any PMB

(*) Endomet hyper.
- Simple: BL. → Prog.; inf. → ind. of ov.
- Complex: D & C & follow up (U/S, D & C)
- Atypical: Hysterectomy

(*) Endomet. carcinoma

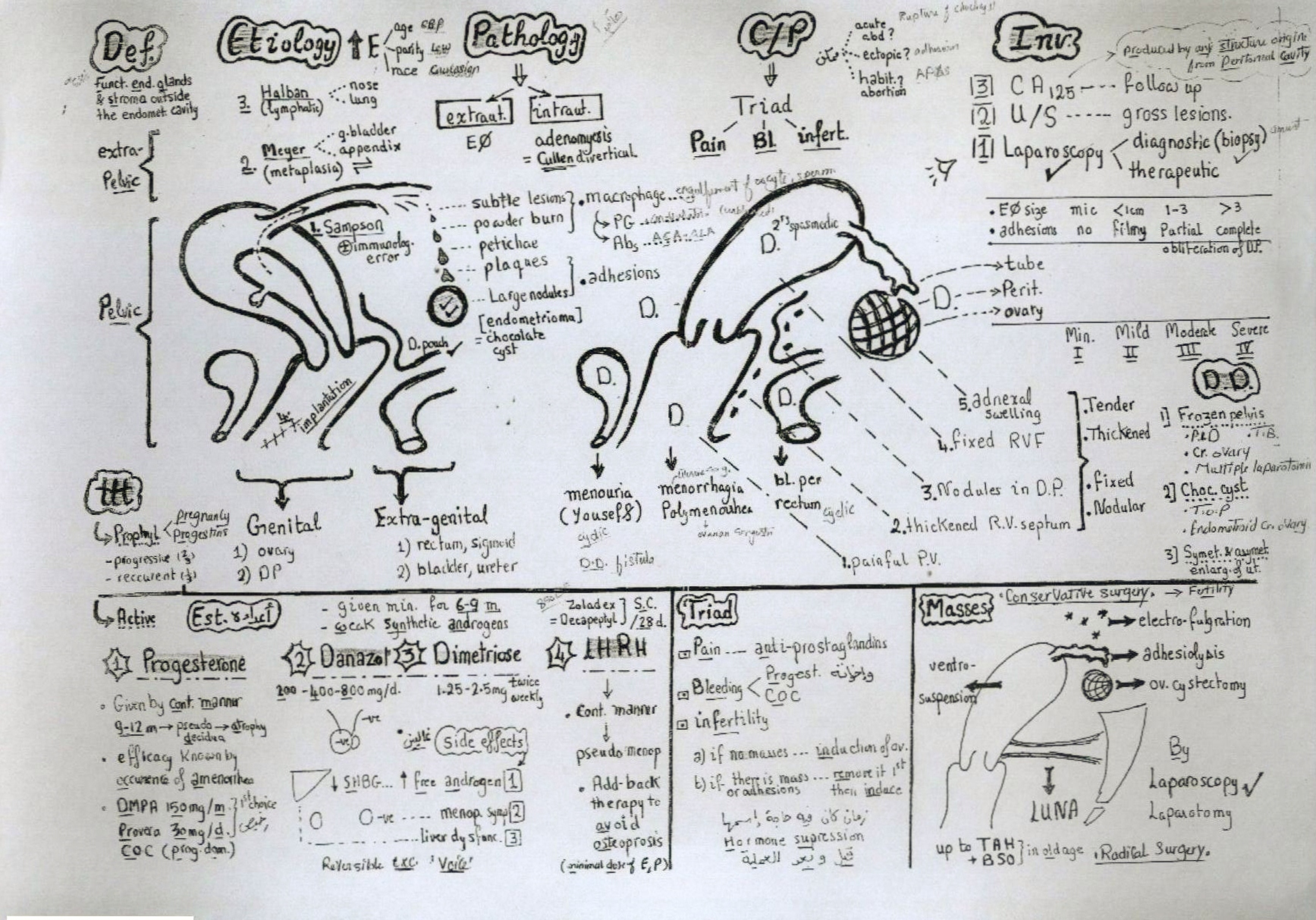
TAH + BSO ليه؟: Source of E; Micro metast.

I Surg. جراحة

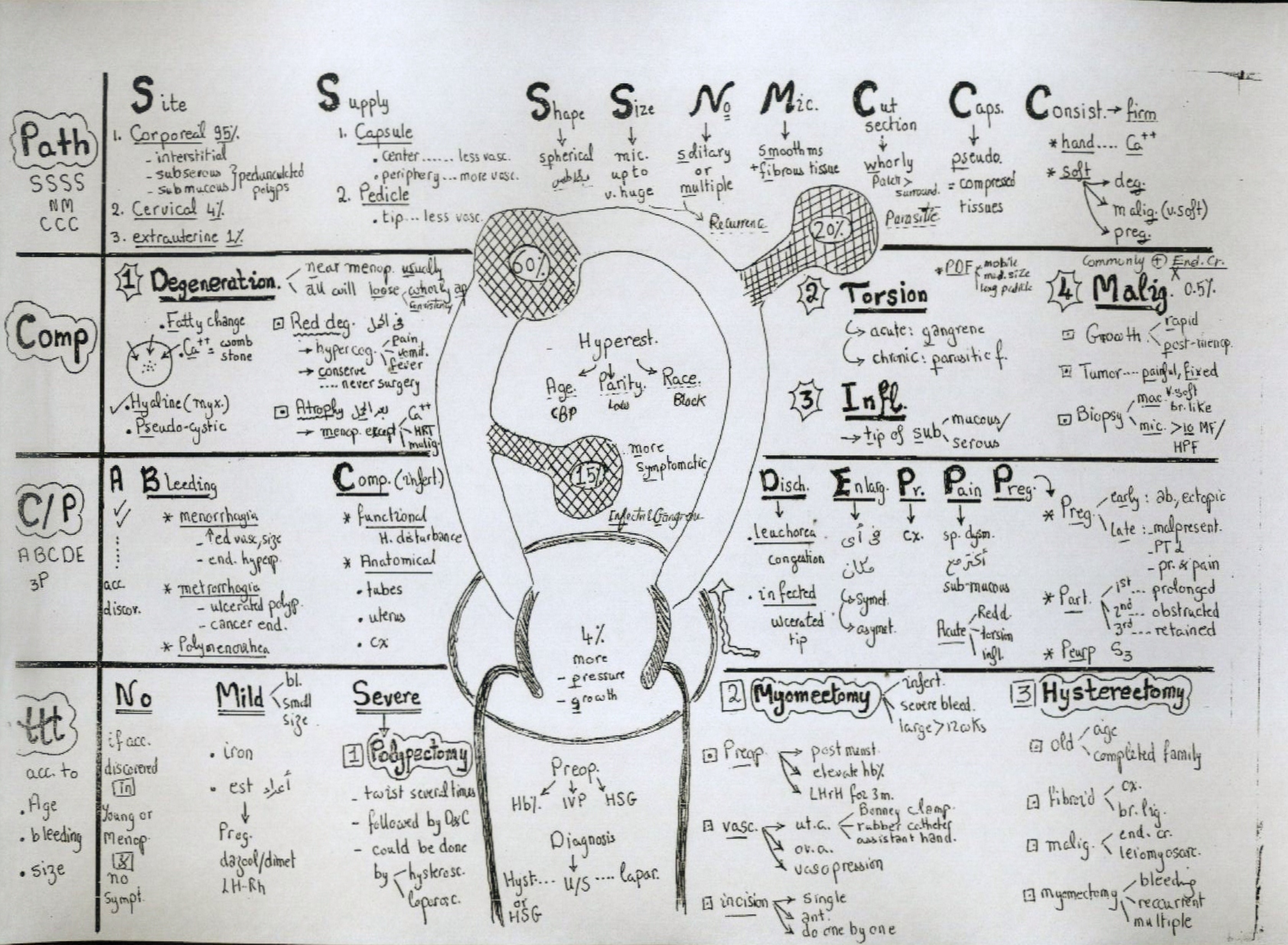
II ⊕
- > ½ myom.
- grade II, III
- L.N. +ve
- Types: Papillary, Clear cell (Serous)

III Rad. أشعة
- Radium, cesium
- ut. cavity, vag.
- Brachy, tele-therapy

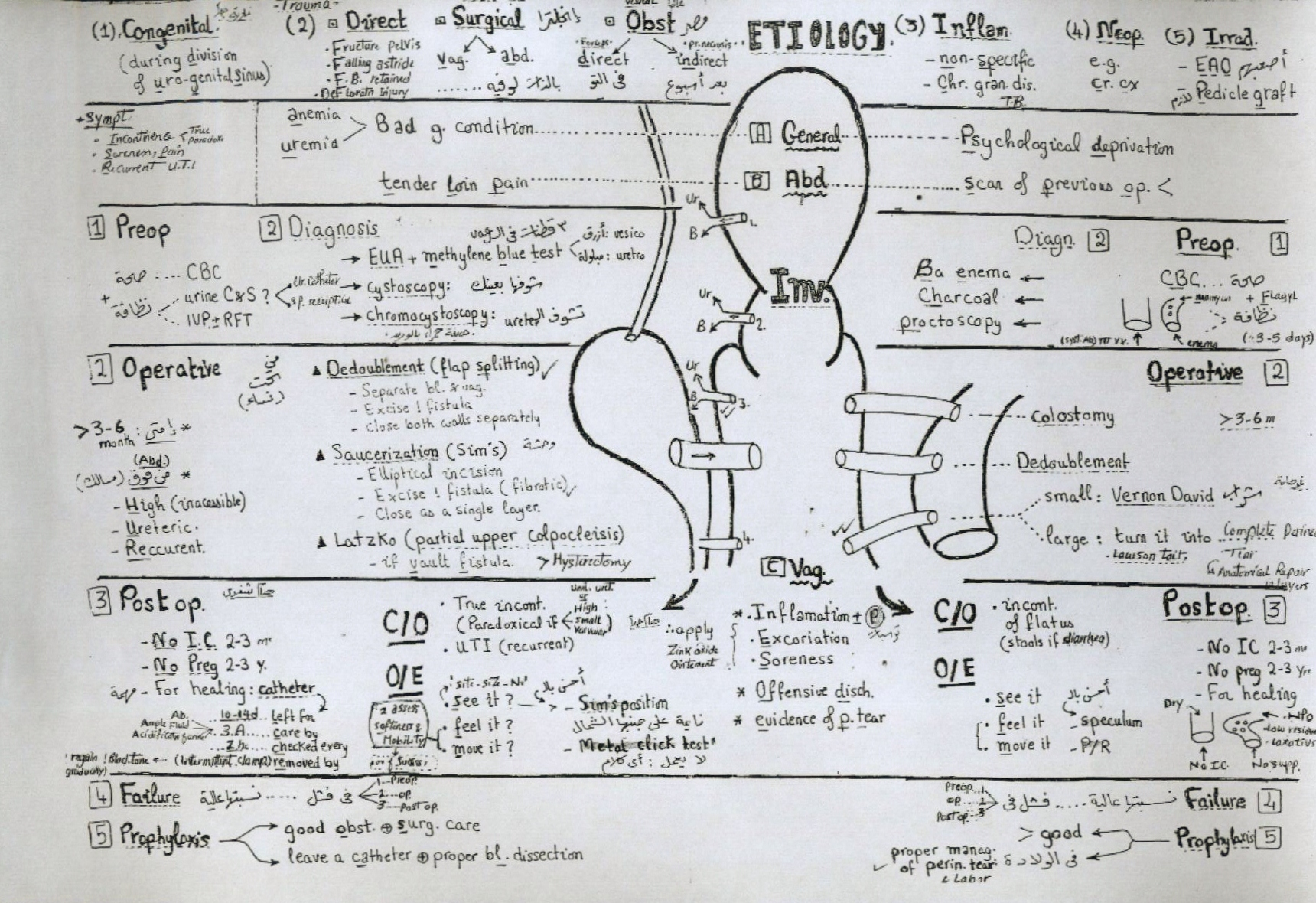
if becomes resectable نادراً جداً



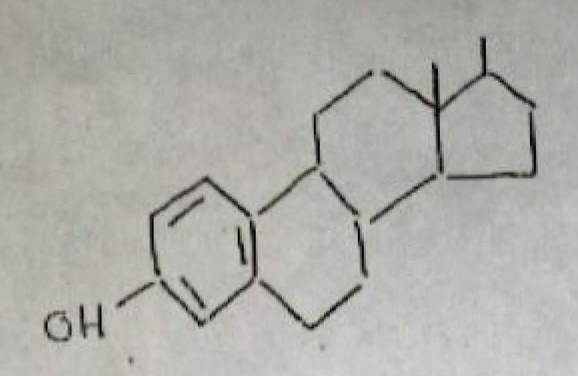
Def.
Funct. end. glands & stroma outside the endomet. cavity
extra-Pelvic
Pelvic
Etiology
↑E age, parity, race
3. Halban (lymphatic) nose, lung
2. Meyer (metaplasia) g. bladder, appendix
1. Sampson ⊕ immunolog. error
implantation
Pathology
extraut.
intraut.
EØ
adenomyosis = Cullen diverticul.
subtle lesions
powder burn
petichae
plaques
Large nodules
[endometrioma] = chocolate cyst
D. pouch
.macrophage
PG
Abs
.adhesions
C/P
acute abd?
ectopic?
habit. abortion
Triad
Pain
Bl.
infert.
2ry spasmodic
D.
tube
Perit.
ovary
5. adnexal swelling
4. fixed RVF
3. Nodules in D.P.
2. thickened R.V. septum
1. painful P.V.
.Tender
.Thickened
.fixed
.Nodular
menouria (Yousef's)
cyclic
D.D. fistula
menorrhagia
Polymenorrhea
bl. per rectum cyclic
Inv.
produced by any structure origin from Peritoneal cavity
3 CA 125 --- follow up
2 U/S ---- gross lesions.
1 Laparoscopy diagnostic (biopsy), therapeutic
.EØ size mic <1cm 1-3 >3
.adhesions no filmy Partial complete obliteration of D.P.
Min. I
Mild II
Moderate III
Severe IV
D.D.
1] Frozen pelvis
.PID
.T.B.
.Cr. ovary
.Multiple laparotomies
2] Choc. cyst
.T.O.P
.Endometrioid Cr. ovary
3] Symet. & asymet. enlarg. of ut.
ttt
Prophyl. pregnancy, progestins
-progressive (2/3)
-reccurent (1/3)
Genital
1) ovary
2) DP
Extra-genital
1) rectum, sigmoid
2) bladder, ureter
Active
Est.
- given min. for 6-9 m.
- weak synthetic androgens
1 Progesterone
.Given by cont. manner
9-12 m → pseudo decidua → atrophy
.efficacy known by occurence of amenorrhea
.DMPA 150 mg/m
Provera 30 mg/d.
COC (prog. dom.)
1st choice
2 Danazol
200-400-800 mg/d.
3 Dimetriose
1.25-2.5 mg twice weekly
Side effects
↓SHBG... ↑free androgen 1
-ve ---- menop. symp 2
liver dysfunc. 3
Reversible exc. 'Voice'
Zoladex = Decapeptyl S.C. /28 d.
4 LHRH
.Cont. manner
pseudo menop
.Add-back therapy to avoid osteoprosis
(minimal dose of E, P)
Triad
Pain --- anti-prostaglandins
Bleeding Progest., COC
infertility
a) if no masses --- induction of ov.
b) if there is mass or adhesions --- remove it 1st then induce
Hormone supression
Masses
Conservative surgery. → Fertility
electro-fulgration
adhesiolysis
ov. cystectomy
ventro-suspension
LUNA
By Laparoscopy
Laparotomy
up to TAH + BSO in old age
Radical Surgery.



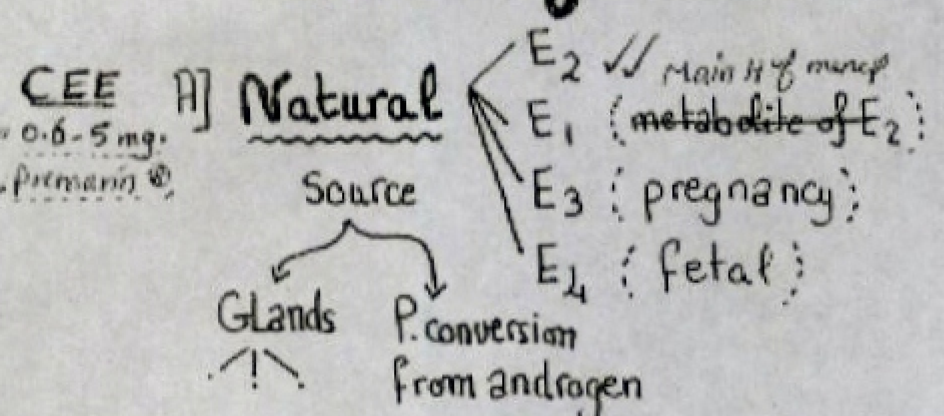
Path
SSSS
NM
CCC
Site
1. Corporeal 95%
- interstitial
- subserous
- submucous
pedunculated polyps
2. Cervical 4%
3. extrauterine 1%
Supply
1. Capsule
. center ...... less vasc.
. periphery ... more vasc.
2. Pedicle
. tip ... less vasc.
Shape
spherical
Size
mic.
up to
v. huge
No
solitary
or
multiple
Recurrenc
Mic.
smooth ms
+ fibrous tissue
Cut section
whorly
Paler > surround.
Parasitic
Caps.
pseudo.
= compressed
tissues
Consist. → firm
* hard .... Ca++
* soft
deg.
malig. (v.soft)
preg.
60%
20%
15%
4%
more
- pressure
- growth
Hyperest.
Age.
CBP
Parity.
Low
Race.
Black
more
symptomatic
Infected & Gangrene
Comp
1 Degeneration.
near menop. usually
all will loose whorly ap. consistency
. Fatty change
. Ca++ = womb stone
✓. Hyaline (myx.)
. Pseudo-cystic
Red deg.
→ hypercog.
pain
vomit.
fever
→ conserve
.... never surgery
Atrophy
→ menop. except
Ca++
HRT
malig.
2 Torsion
* PDF
mobile
mod. size
long pedicle
acute: gangrene
chronic: parasitic f.
3 Infl.
→ tip of sub
mucous
serous
4 Malig. 0.5%
Commonly + End. Cr.
Growth
rapid
post-menop.
Tumor .... painful, fixed
Biopsy
mac
v. soft
br. like
mic. > 10 MF/HPF
C/P
ABCDE
3P
A
acc.
discov.
B leeding
* menorrhagia
_ ↑ed vasc, size
- end. hyperp.
* metrorrhagia
- ulcerated polyp.
- cancer end.
* Polymenorrhea
Comp. (infert.)
* functional
H. disturbance
* Anatomical
. tubes
. uterus
. cx
Disch.
. leuchorea
congestion
. infected
ulcerated tip
Enlarg.
Symet.
asymet.
Pr.
cx.
Pain
sp. dysm.
sub-mucous
Acute
Red d.
torsion
infl.
Preg.
* Preg.
early: ab., ectopic
late: malpresent.
PT
- pr. & pain
* Part.
1st ... prolonged
2nd ... obstructed
3rd ... retained
* Peurp S3
ttt
acc. to
. Age
. bleeding
. size
No
if acc.
discovered
Young or Menop.
no Sympt.
Mild
bl.
small size
. iron
. est
Preg.
dazool/dimet
LH-Rh
Severe
1 Polypectomy
- twist several times
- followed by D&C
- could be done by
hysterosc.
laparosc.
Preop.
Hb%.
IVP
HSG
Diagnosis
Hyst ... or HSG
U/S
.... lapar.
2 Myomectomy
infert.
severe bleed.
large>12wks
Preop.
post menst.
elevate hb%
LHrH for 3m.
vasc.
ut.a.
Bonney clamp.
rubber catheter
assistant hand.
ov.a.
vasopression
incision
single
ant.
do one by one
3 Hysterectomy
old
age
completed family
fibroid
cx.
br. lig.
malig.
end. cr.
leiomyosarc.
myomectomy
bleeding
reccurrent
multiple



ETIOLOGY
(1) Congenital
(during division of uro-genital sinus)
Trauma
(2) Direct
Fracture pelvis
Falling astride
F.B. retained
Defloration injury
Surgical
Vag.
abd.
Obst
direct
indirect
(3) Inflam.
- non-specific
- Chr. gran. dis.
T.B.
(4) Neop.
e.g.
Cr. cx
(5) Irrad.
- EAQ
Pedicle graft
Sympt.
Incontinence
True
paradox
Soreness; pain
Recurrent U.T.I
anemia
uremia
Bad g. condition
A General
Psychological deprivation
tender loin pain
B Abd
Scan of previous op.
1 Preop
2 Diagnosis
EUA + methylene blue test
vesico
uretro
CBC
urine C&S ?
IVP ± RFT
Ur. catheter
sp. receptible
cystoscopy
chromocystoscopy
ureter
Im.
Ur
B
Diagn. 2
Preop. 1
Ba enema
Charcoal
proctoscopy
CBC
Flagyl
(3-5 days)
enema
1 Operative
> 3-6 month
(Abd.)
- High (inaccessible)
- Ureteric.
- Reccurent.
Dedoublement (flap splitting)
- Separate bl. & vag.
- Excise ! fistula
- close both walls separately
Saucerization (Sim's)
- Elliptical incision
- Excise ! fistula (fibrotic)
- Close as a single layer.
Latzko (partial upper colpocleisis)
- if vault fistula.
> Hysterectomy
Operative 2
Colostomy
> 3-6 m
Dedoublement
small: Vernon David
large: turn it into Complete Perineal Tear
Lawson tait,
Anatomical Repair
C Vag.
3 Postop.
- No I.C. 2-3 m
- No Preg 2-3 y.
- For healing: catheter
10-14 d. left for
3.A..... care by
2 h..... checked every
(intermittent clamp) removed by
C/O
True incont.
(Paradoxical if
High
Small
UTI (recurrent)
apply
Zink oxide
Ointment
Inflamation ± P
Excoriation
Soreness
Offensive disch.
evidence of p. tear
O/E
see it ?
feel it ?
move it ?
Sim's position
Metal click test
C/O
incont. of flatus
(stools if diarrhea)
O/E
see it
feel it
move it
speculum
P/R
Postop. 3
- No IC 2-3 m
- No preg 2-3 y
- For healing
Dry
No IC
No supp.
Laxatives
4 Failure
1 Preop
2 op.
3 Post op.
Failure 4
5 Prophylaxis
good obst. ⊕ surg. care
leave a catheter ⊕ proper bl. dissection
> good
proper manag. of perin. tear
Prophylaxis 5



Estrogen 18



B] **Semi-synthetic**
- Ethinyl estradiol
- Mestranol

C] **Synthetic**
- Stilbesterol
- D.E.S.

Progesterone 21

"Uterogestan"

A] **Natural**
- ovary (C.L.)
- Placenta
- supra-renal (small amount)

B] **Synthetic**
- 1^{st}
  - estrane .... Nor
  - pregnane .... MPA
- 2^{nd} — levonorgestrel
- 3^{rd}
  - Desogestrel
  - Gestodene (gynera)
  - Norgestimate

Both are
- Bound (99% SHBG)
- free level (1%)
- metab. in liver (prog ..... pregnandiol)

-ve on FSH
+ve on LH
-ve on both
thermogenic
stim resp. (dyspnea)

Ductal system
1
Glandular system

⇑ all binding globulins ... Eg.
Salt & H_2O retention — obesity, HPN
relax smooth ms — ureter, G.I.T.
+ve osteoblasts

2 **metab.**
anabolic .... Ptn
سكر .... CHO
LDL ↓, HDL ↑ — جيد .... lipid
بيزود .... Coag.
.... salt & H_2O ret. ... obesity

3
Proliferation
↑ oxyt. R.
• Secretory endomet.
مع الوقت .... pseudodecidua & atrophy
• ↓ sensitivity to oxyt .... relaxant.

+ve Spinb.
+ve Fern
> fluidy sec. + Goodel
acidic + glycog. + thick + Chadwick
Jacque Meir
↓ thickness & acidity
intermediate basophilic cells

Uses

1] **To improve vulva & vagina**
- Prepub., post menop. V. vaginitis
- Vulval dystrophy
- Trophic ulcer in prolapse

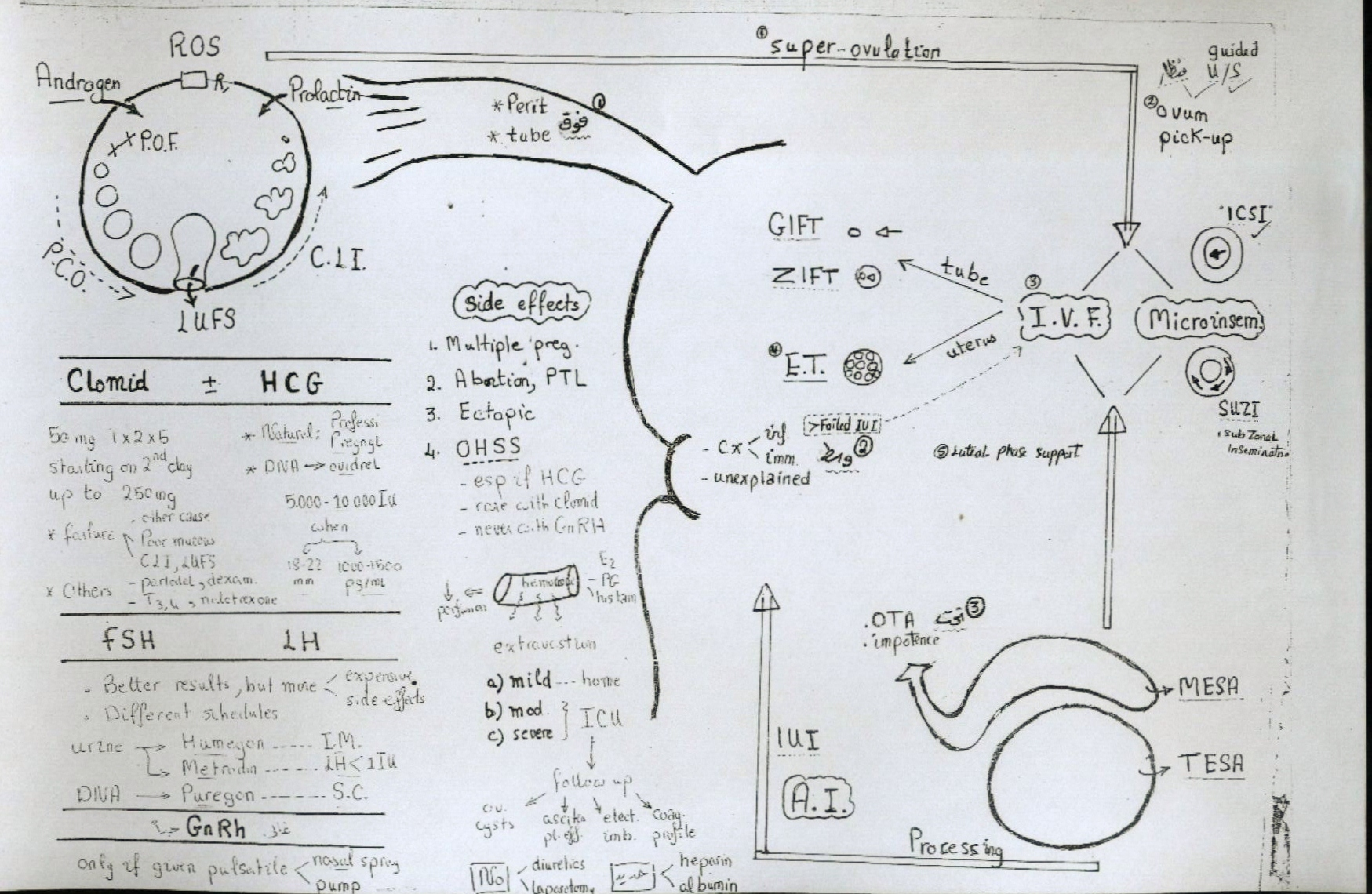
2] **ERT** → Turner, Mullerian agenesis, TF
3] **Bleeding** → Acute
4] **infertility** → with clomid
5] **Contraception** → emergency

both :-
- C.O.C.
- H.R.T.
- D.U.B.
- P.M.T.
- & spasmodic dysmenorrhea

1] **Obst**
- Abortion
  - threatened
  - CLI
  - habit. ab.
- Before surgery during preg.

2] **Gyna**
est. عدو ال
أي مرض ناتج عن Hyper-est.
Eg. .EQ, .End., .End.

① Etiology					② Assesment		③ ttt
Cong.	Tr.	Inf.	Neop.	Misc.	History	Invest.	ART آخر حل لو فشلنا
I H.P. failure	II H.P. dysfunction 1ry √ (PCO)	III ovarian failure	Others · Prolactin ↑ · androgen ↑ · CLI · LUFS		disch. / pain / spotting ⇐ "E" mid-cyc. "C.L." ⇒ Regular / sp. dysm. / PMT ± genital endoc. < am.... PPI bleed / galactorrhea / hirsutism ± general endoc. أعراض أخرى	folliculometry, laparosc. → G. (T.) / L. LH في البول √ Prog. √ PEB Spinbarkei Fern vaginal cytology	{induction of ovulation}
- hypoplasia - diverticul. - ostium	surgery on / near	PID 2ry √√	stretching tube fib. / ov. cyst	EØ < anatomy / function	· Previous surgery · PID < fever / abd. pain / discharge · EØ < Pain ---- 6D / bleeding / infertility	laparoscope → Tuboscope → T. cannulation 5th-7th هوا -- insuft. صبغة -- HSG مياه -- HyCoSy	· Tuboplasty → laparosc. / laparot. / hys · EØ < ind. of ov / surgery
· Mullerian agenesis · TFS	↘ Ascherman ↙		fibroid	displacement · Congestion ·	- previous surgery < D&C / C.S. - fibroid (ABCDE PPP) - postpartum < hge (sheehan) / inf. (Ascherman)	1- Uterine sound 2- U/S 3- HSG 4- Hyst. scope 5- HyCosy 6- PEP	Surgery
Atresia	· cauterization · amputation · cone biopsy	Chronic cervicitis	Polyp	Poor cx mucous {1. wrong time 2. ↓ gland < surgery / clomid} {3. infection 4. immunolog.}	· Purulent discharge · Low back-ache · deep dysparuenia	mid-cycle N. semen → PCT ⇒ { mucous : Moghisi score / sperm : 5-20 forward } if -ve → sperm penetration < slide / tube	· inf. → Antib / → caute · Imm. → cstd · Poor → E
Septum	surgery → scarring	hostile sec.	rare	Abs < agglutin. / immobiliz.	sexual H. < dysparuenia / frequency / use of lubricant	semen → Azo / OTA Azo → Test. biopsy → +ve → obst. -ve → FSH عالي → 1ry failure → Karyotype -ve → FSH واطي → 2ry failure → CT brain OTA → C&S / imm. assay	impotence - Psychotherapy - surg. correction
- Hypospadius Epispadius	spinal surg. ↳ retrograde ej. ↙ DM			· impotence · premature ejac.	· DM · anti < hypert. / depressants		
- Cong. abs. vas - cystic fibrosis - Kartagener S	surgery (Hernia)	· epididymitis · Prostatitis √√	rare		→ urethral disch. → previous surg.		OTA antibiotics mucolytics steroids ⇓ AIH (if failure)
· Sertoli cell only synd. · undesc. T.	· Direct · Thermal √ · irradiation	Mumps	rare	2^{ry} test. failure (low FSH)	· cytotoxic drugs · irradiation · anti < fungal / malarial		



ROS
Androgen
Prolactin
P.O.F.
P.C.O.
C.L.I.
LUFS
* Perit
* tube
فوق
① super-ovulation
guided U/S
② ovum pick-up
GIFT
ZIFT
tube
③ I.V.F.
④ E.T.
uterus
ICSI
Microinsem.
SUZI
Sub Zonal Inseminatn.
Side effects
1. Multiple preg.
2. Abortion, PTL
3. Ectopic
4. OHSS
- esp if HCG
- rare with clomid
- never with GnRH
E2
PG
histam
extravastion
a) mild --- home
b) mod
c) severe
ICU
follow up
ov. cysts
ascites pl. eff.
elect. imb.
coag. profile
No
diuretics
laparotomy
heparin
albumin
Clomid ± HCG
50 mg 1x2x5
starting on 2nd day
up to 250 mg
* failure
other cause
Poor mucus
CLI, LUFS
* Others
- parlodel, dexam.
- T3,4, naltrexone
* Natural: Professi Pregnyl
* DNA → ovidrel
5.000 - 10 000 IU
when
18-22 mm
1000-1500 pg/ml
FSH LH
- Better results, but more
expensive
side effects
- Different schedules
urine → Humegon ----- I.M.
Metrodin ------- LH < 1IU
DNA → Puregon ------ S.C.
GnRh
only if given pulsatile
nasal spray
pump
- Cx
inf.
imm.
- unexplained
> Failed IUI
② 2ig
⑤ Luteal phase support
.OTA
.impotence
③
MESA
TESA
IUI
A.I.
Processing

Embryology → Products → Ovarian tumors

[Depends on Origin]

- They can produce any cell in the body
- They have v. good memory

Neoplastic

- 1ry
- 2ry (20%) "Krukenberg" atypical

3. Germ-Cell tumor (5-10%)

- They can produce any cell in the body
- V. good memory

- dysgerminoma
- Embryoma
  - embryonic: Teratoma
  - extra-embryonic: Chorio Cr.

- * Undiff.
- * Poorly differ.
- * Well diff.

2. Sex-Cord, stroma (10%)

- ♀ • Gr. theca
- ♂ • Sertoli-leydig

]• gynandro-blastoma (الاتنين مع بعض)

1. Common epith. tumors (70-80%)

- Serous
- Endometroid
- Mucinous

} Mullerian

- Mesonephroid (Malig.)
- Brenner (benign)

} Wolffian

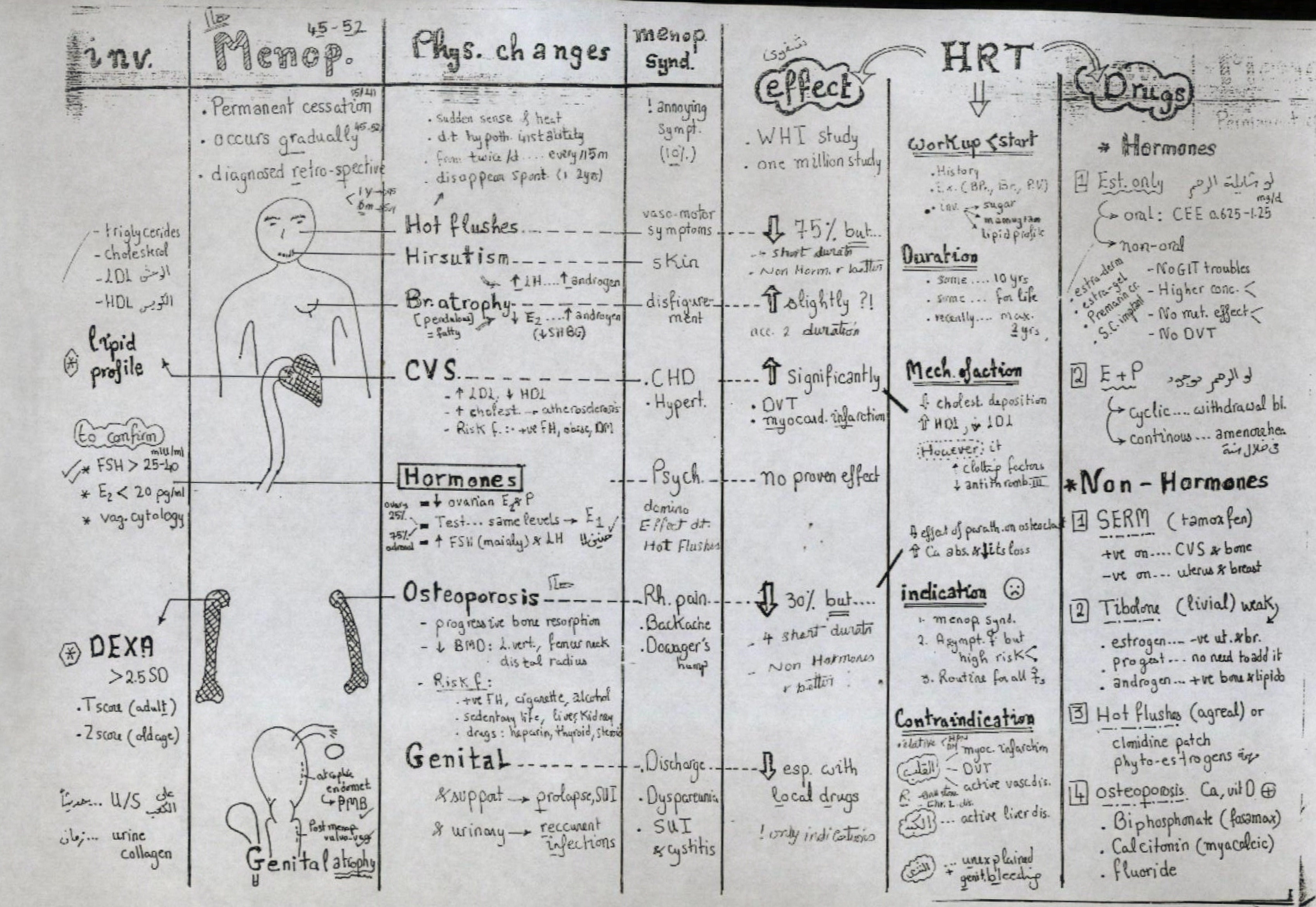
Non-neoplastic

- functional ov. cyst صغيرة < 6cm

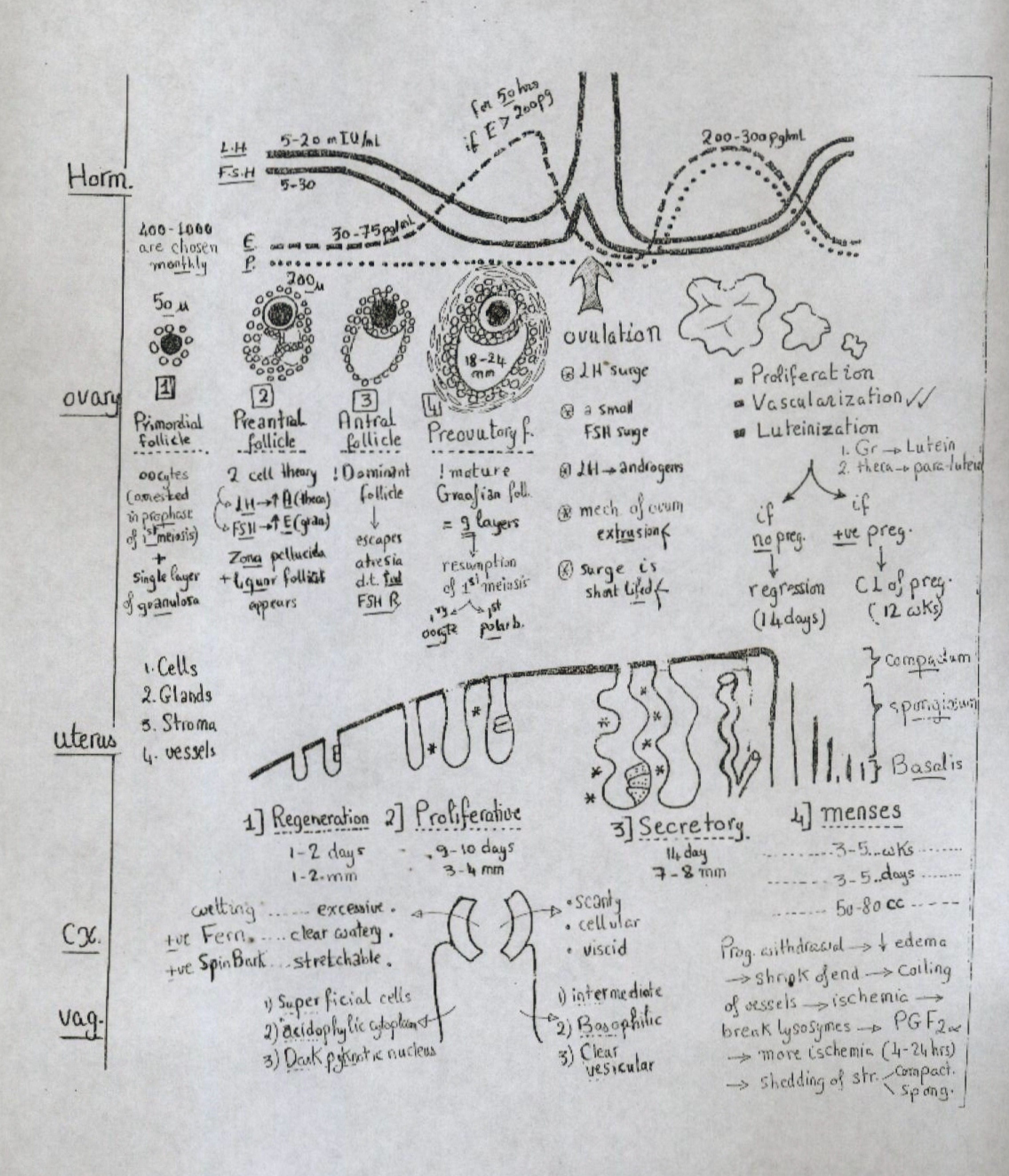
- PCO
- EØ (chocolate)
- TOA

- Para-ovarian cyst
- Theca lutein cyst
- Preg. luteoma cyst

- uro-genital ridge
- M.
- W.
- hind gut
- Mullerian duct
- Wolffian duct
- Coelomic products
- sex stroma — theca cells (or Leydig)
- sex cords — granulosa cells (or sertoli)
- P.C. system
- ureteric bud
- Trigone

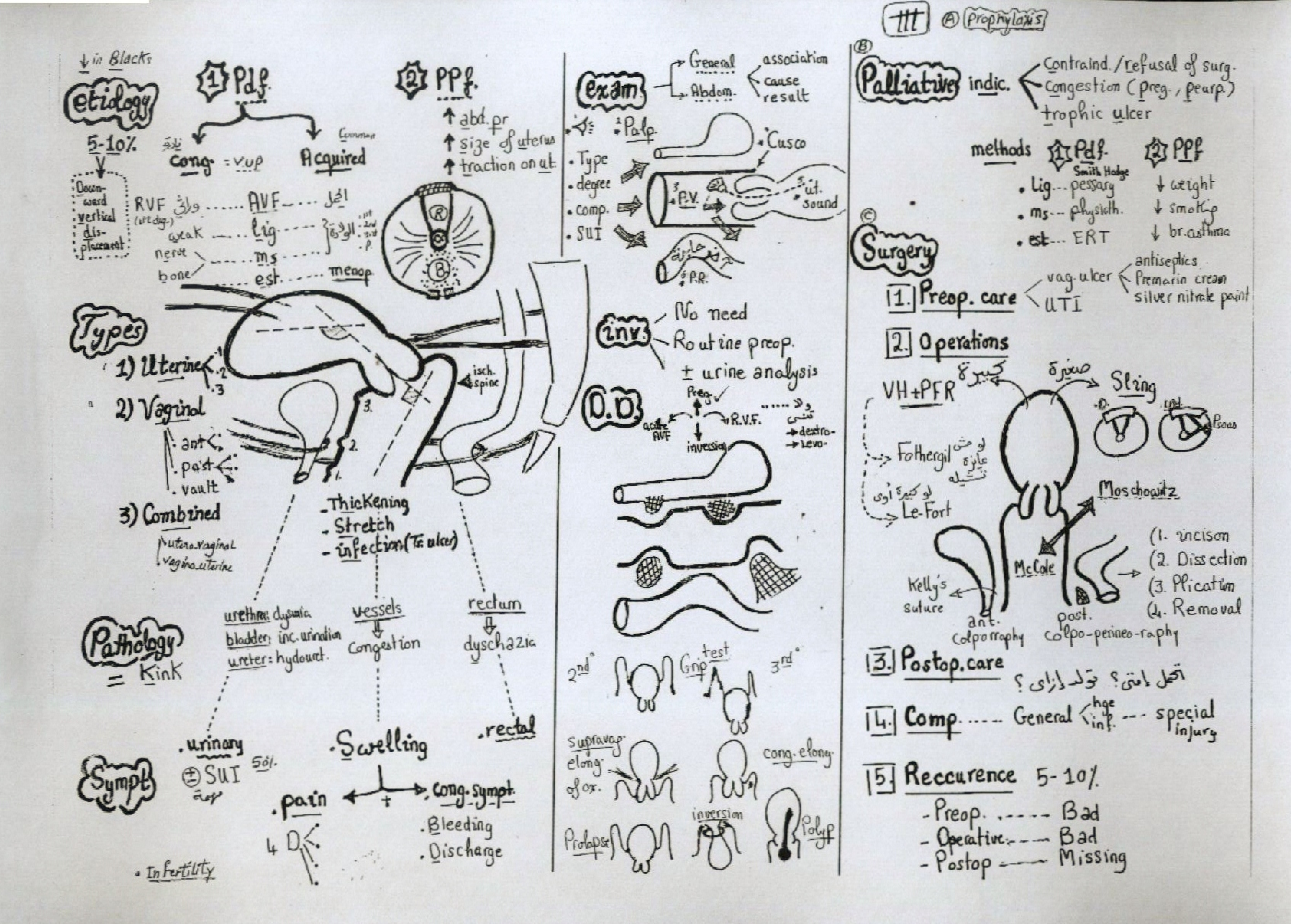


inv.
Menop. 45-52
Phys. changes
menop. Synd.
effect
HRT
Drugs
. Permanent cessation
. occurs gradually 45-52
. diagnosed retro-spective
. sudden sense of heat
. d.t hypoth. instability
. from twice/d .... every 1/15m
. disappear spont. (1 2yrs)
! annoying Sympt. (10%)
. WHI study
. one million study
Workup < start
. History
. Ex. (BP., Br., P.V)
. inv. → sugar → mammogram → lipid profile
Duration
. some .... 10 yrs
. some ... for life
. recently .... max. 3 yrs
* Hormones
1 Est. only لو شايلة الرحم
→ oral: CEE 0.625-1.25 mg/d
→ non-oral
. estra-derm
. estra-gel
. Premarin cr.
. S.C. implant
- No GIT troubles
- Higher conc. <
- No met. effect <
- No DVT
- triglycerides
- cholesterol
- LDL الوحش
- HDL الكويس
lipid profile
Hot flushes
vaso-motor symptoms
⇩ 75% but...
→ short durati
- Non Horm. r better
Hirsutism
skin
↑ LH ... ↑ androgen
Br. atrophy
[pendulous] = fatty
↓ E2 ....↑ androgen (↓SHBG)
disfigurement
⇧ slightly ?!
acc. 2 duration
CVS
- ↑ LDL, ↓ HDL
- ↑ cholest. → atherosclerosis
- Risk f.: +ve FH, obese, DM
. CHD
. Hypert.
⇧ Significantly
. DVT
. myocard. infarction
Mech. of action
↓ cholest. deposition
⇧ HDL, ↓ LDL
However: it
↑ clotting factors
↓ antithromb. III
2 E + P لو الرحم موجود
→ cyclic .... withdrawal bl.
→ continous ... amenorrhea 3 شهور
to confirm
* FSH > 25-40 mIU/ml
* E2 < 20 pg/ml
* vag. cytology
Hormones
ovaries 25% ↓ ovarian E2 & P
- Test... same levels → E1
75% adrenal - ↑ FSH (mainly) & LH
Psych.
domino Effect d.t. Hot Flushes
no proven effect
↓ effect of parath. on osteoclast
⇧ Ca abs. & ↓ its loss
* Non - Hormones
1 SERM (tamoxifen)
+ve on .... CVS & bone
-ve on ... uterus & breast
Osteoporosis
- progressive bone resorption
- ↓ BMD: L. vert., femur neck, distal radius
- Risk f.:
. +ve FH, cigarette, alcohol
. sedentary life, liver, Kidney
. drugs: heparin, thyroid, steroid
Rh. pain
. Backache
. Dowager's hump
⇩ 30% but....
→ short durati
- Non Hormones r better
indication ☹
1. menop. synd.
2. Asympt. ♀ but high risk <
3. Routine for all ♀s
2 Tibolone (livial) weak
. estrogen .... -ve ut. & br.
. progest ... no need to add it
. androgen ... +ve bone & lipids
* DEXA
> 2.5 SD
. T score (adult)
. Z score (old age)
Genital
& suppat → prolapse, SUI
& urinary → reccurent infections
. Discharge
. Dyspareunia
. SUI & cystitis
⇩ esp. with local drugs
! only indications
Contraindication
. relative (HPN, DM)
- myoc. infarction
- DVT
- active vasc dis.
Chr. L. dis.
- active liver dis.
unexplained genit. bleeding
3 Hot flushes (agreal) or
clonidine patch
phyto-estrogens
4 osteoporosis Ca, vit D ⊕
. Biphosphonate (fosamax)
. Calcitonin (myacalcic)
. fluoride
U/S على الكبد .... endometrium
urine ... collagen
atrophic endomet. → PMB
Post menop. vulvo-vag
Genital atrophy



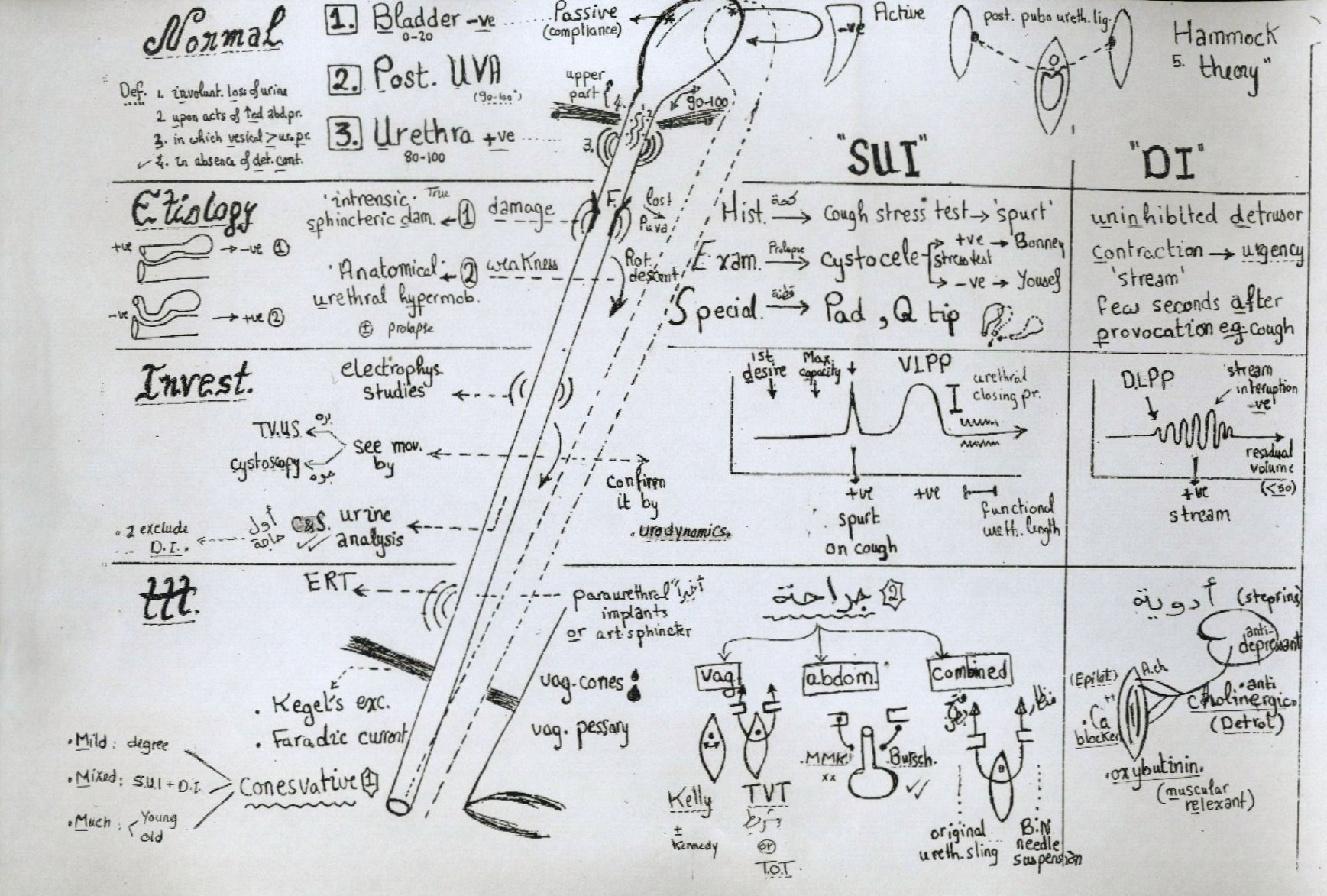
Cholest 27c
↓
Progest 21c
↓
Androgen 19c
↓
Estrogen 18c

There is -ve feedback loop
except one

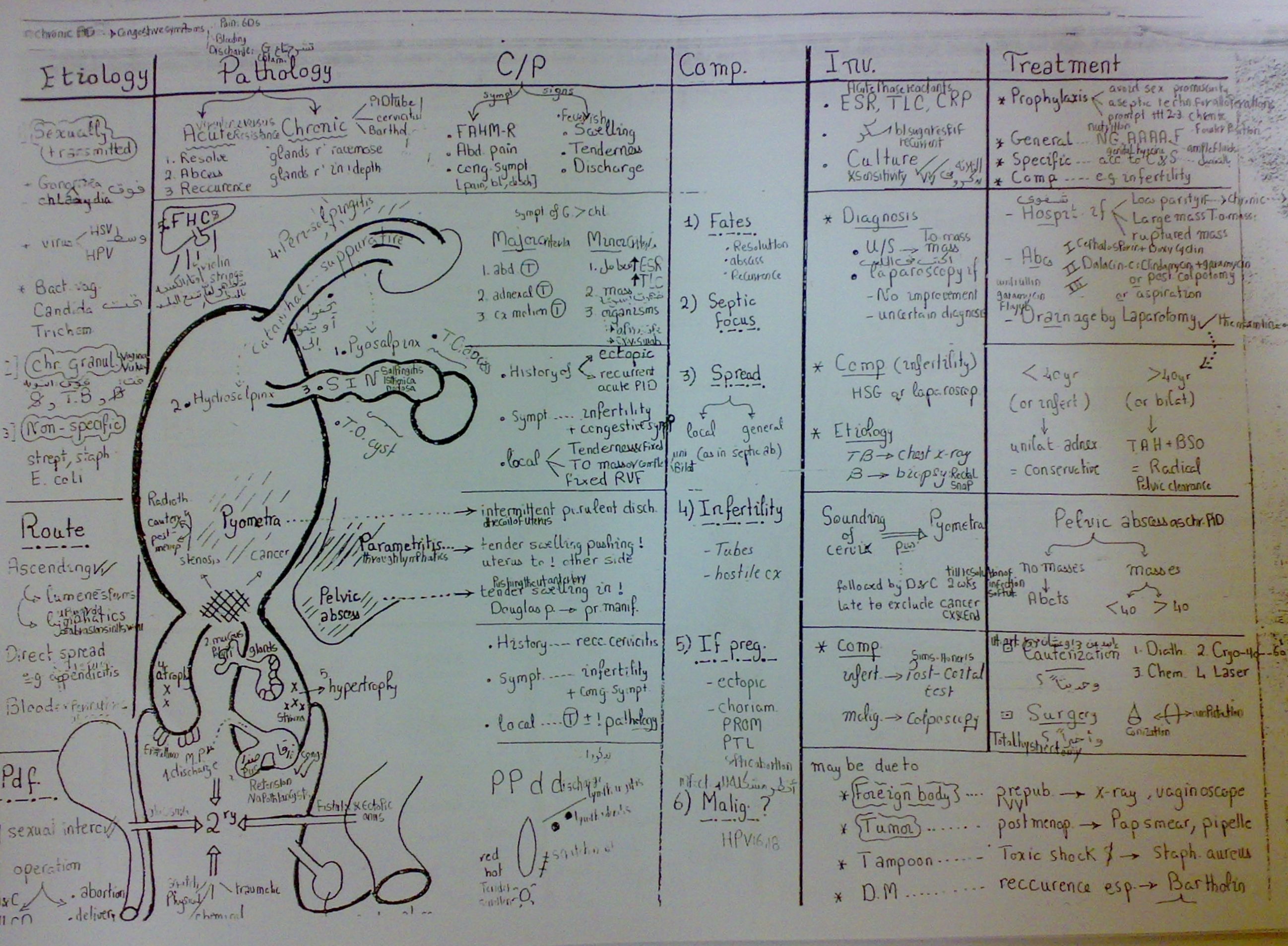


III
(A) Prophylaxis
↓ in Blacks
Etiology
5-10%
Down-ward vertical dis-placement
1 Pdf.
Cong = VUP
Acquired
Common
RVF (ut.deg.)
AVF
lig
ms
est
weak
nerve
bone
menop.
2 PPf.
↑ abd. pr
↑ size of uterus
↑ traction on ut.
Types
1) Uterine
2) Vaginal
ant
post
vault
3) Combined
utero-vaginal
vagino-uterine
isch. spine
Thickening
Stretch
infection (Tr. ulcer)
Pathology = Kink
urethra: dysuria
bladder: inc. urination
ureter: hydroureter
vessels
congestion
rectum
dyschazia
Sympt
urinary
± SUI
50%
Swelling
pain
cong. sympt.
4 D
Bleeding
Discharge
rectal
Infertility
exam
General
Abdom.
association
cause
result
Palp.
Type
degree
comp.
SUI
Cusco
P.V.
ut. sound
P.R.
inv.
No need
Routine preop.
± urine analysis
D.D.
Preg.
acute AVF
R.V.F.
inversion
dextro-
levo-
2nd
Grip test
3rd
supravag. elong. of cx.
cong. elong.
Prolapse
inversion
Polyp
(B) Palliative
indic.
Contraind. / refusal of surg.
Congestion (preg., peurp.)
trophic ulcer
methods
1 Pdf.
lig... pessary
Smith Hodge
ms... physioth.
est... ERT
2 PPf
↓ weight
↓ smoking
↓ br. asthma
(C) Surgery
1. Preop. care
vag. ulcer
UTI
antiseptics
Premarin cream
silver nitrate paint
2. Operations
VH + PFR
Fothergil
Le-Fort
Sling
Psoas
Moschowitz
McCall
Kelly's suture
ant. colporraphy
post. colpo-perineo-raphy
1. incision
2. Dissection
3. Plication
4. Removal
3. Postop. care
4. Comp. ---- General
hge
inf.
--- special
injury
5. Reccurence 5-10%
- Preop. ---- Bad
- Operative ---- Bad
- Postop ---- Missing

	Gonorrhea -D-	B. vaginosis	Chlamydia -H-	(2) Candida	(3) Trich. vag.	HSV II	HPV	T.B.	B.
org.	G -ve IP 3-7 days	- H. vag (Gard. vag.) G -ve - mycoplasma hum. - ureaplasma ur.	Virus ← → bact. DNA RNA Abcs	spores, Hyphae mycelia Albicans, Trop, Krusei	> pus cell	DNA II > I 20%	70 serotype	Mycobacterium tuberc. > bovis	Schistosoma haemat. > mansoni
Pdf. & route of inf.	. Adult ... STD . child ... contamination عن طريق الأم . Neoborn ... وقت الولادة ophthalmia neonatorum	60% of vulvovag. (10-25% ...) replacement of normal flora e.g. lact. bacillus ALK. medium	15 serotype [*] ABC ... trachoma [*] D-K ... STD Δ. col. epith. (G) si . preg ... سلك . neoborn ... Pneumonia, ophthalmia . male ... سلك [*] L_{123} ... LGV	(2) Contamination (20-40%) Normal habitant (50%) acidic + humid: si; - حمل; - COC; ↑ glycogen . certain media . ↓ resistance سكر . loss of balance (prolonged use) antibiotics → alk.		viral encephalitis, myelitis Preg. - neoborn retention 2^{ry} inf.	laryngeal papilloma recurrence in 60% cr. cx 16, 18	. Blood borne ✓ . Peritoneal . lymphatic . Ascending with semen	through Recto-vaginal - cervico plexus of veins
C/P	spread FHC 2^{ry} PID 1^{ry} M.P. discharge	osis ✓ ↓ mild discharge only ↓ fishy excessive greyish itis x asympt. ↓ 50% No - PPdd - pus cells	edema → fibrosis → stricture L.N. matting fistula	pre ..... Menst. ..... post PPdd odorless ..... Disch. ..... malodorous Curdy white, thick ..... greenish frothy, profuse adherent white patches on removal → Bleeding (slight) ..... O/E ..... strawberry vagina → Colposcope → T-shaped VC		1^{ry} ↓ شديد; 2^{ry} ↓ خفيفة . fever ...... -ve . L.N. ...... -ve . painful vesicle → ulcer	6 ... 11 condyloma . accuminatum . flat (cervix) . inverted	100% ... C/P of ch. PID 50%, 5% * Tubercles * Caseation * Polypi * ulcers	rare 100% * Polyps * Sandy patch * calcif. * ulcers
Inv. - Ph - smear - C - & Ag. detect. - Serology	(endocx) 1^{ry} sites; (rectum, pharynx) 2^{ry} sites smear: ميني؟ C: Thayer Martin, New York city Elisa خراطيم CFT, HAI	(1) ... 3 of 4 (2) > 4.5 (3) Clue cells (granular epith. vagin.; just since gram stain) (4) Whif test (10% KOH) → fishy odor	oil immersion field inclusion bodies ⊕ > to pus cells .... MacCoy تأخذ وقت .... ELisa سريع .... PCR دقيقة . Micro I.F.T. كتير غالي	<4.5 ..... Ph ..... >4.5 +ve ..... Gram ..... -ve . Hyphae, mycelia ..... Freshdrop ..... Motile flagellated org. Sabouraud, Nickerson ← Culture → Diamond, Feinberg, Trichocele Ag-detectn		eosinophilic IN inclusion bodies in multi-nucleated giant cells * S * culture on choriallantoic membrane	vaculated multi-nuclear cells Koilocytes شبه ال malig. ∴ Colposcopy, Pap stain, biopsy	G. ⟨ chest x-ray, ESR HSG - lap. . Zeil Nelsen . Low. Jensen . G.P. inocul. biopsy	G. ⟨ urine, stool: ova - Biopsy - Endoscopy (laparoscopy) - CFT
ttt	* Procaine penicillin 4.8 IM ⊕ 1 gm probenecid * Spectinomycin 2 gm IM * Rocephin (ceftriaxone) 250 mg I.M. if chronic → surgery: 1. Barth. 2. cervicitis 3. PID Erythromy or Tetracyclin 1x4x7 esp. if ⊕ chlamydia 5 cm	ليه نتعالج؟! Comp = septic focus Postop. - Gyna & obst * Clind. 300 1x2x7 * Flagyl 250 1x3x7	Azithromycin 1 g. single dose or أي حاجة mycin	alkaline douche ← Prophylaxis → acidic douche Drugs L.: 1) mycostatin 2) canestan 3) Gynodaktarin S.: . Diflucan . Sporanox L.: Flagyl 500 S.: 1) Flagyl 2) Tenidazole 3) Ornidazole Reccurence = طول فترة العلاج = بلاش تنظيف دور على السبب = عالج الزوج		. painful ... sympt. . 2^{ry} inf. ... Abcs . Anti-virals: Interferon a / vala / fam cyclovir ±	1) Chem. cautery . Trichloro acetic acid 75% . Podophylin resin . Imiquimod (self applied) 2) Cryocaut., Laser 3) Surg. excision	. Isoniazid 5 . Rifampicin 10 . Ethambutol 15 * No tubal microsurgery	. Biltricide (Praziquantel) . Amblihar + surgical excision of vulval polyps



Normal
1. Bladder -ve
0-20
2. Post. UVA
(90-100°)
3. Urethra +ve
80-100
Passive (compliance)
Active
-ve
post. pubo ureth. lig.
Hammock
5. theory"
Def. 1. involunt. loss of urine
2. upon acts of ↑ed abd.pr.
3. in which vesical > ur.pr.
4. in absence of det. cont.
upper part 4.
90-100
"SUI"
"DI"
Etiology
+ve → -ve ①
-ve → +ve ②
'intrensic' True sphincteric dam. ← ① damage
'Anatomical' ← ② weakness
urethral hypermob.
± prolapse
lost Puva
Rot. descent
Hist. → Cough stress test → 'spurt'
Exam. Prolapse → cystocele → +ve → Bonney stress test → -ve → Yousef
Special → Pad, Q tip
uninhibited detrusor contraction → urgency
'stream'
few seconds after provocation eg. cough
Invest.
electrophys. studies
T.V.U.S.
see mov. by
cystoscopy
confirm it by
urodynamics.
1 exclude D.I.
C&S. urine analysis
1st desire
Max. capacity
VLPP
urethral closing pr.
+ve
spurt on cough
+ve
functional ureth. length
DLPP
stream interuption -ve
residual volume (<50)
+ve
stream
ttt.
ERT
paraurethral implants or art. sphincter
جراحة ②
Vag.
abdom.
Combined
vag. cones
vag. pessary
Kegel's exc.
Faradic current
Kelly
± Kennedy
TVT
or
T.O.T.
MMK
xx
Bursch.
original ureth. sling
B.N. needle suspension
Mild : degree
Mixed : S.U.I + D.I.
Much : Young old
Conesvative ①
أدوية (stepping)
anti-depressant
(Epilat)
A.ch
Ca blocker
anti Cholinergic (Detrot)
oxybutinin (muscular relexant)



chronic PID → Congestive symptoms
Etiology
Pathology
C/P
Comp.
Inv.
Treatment
Sexually transmitted
Gonorrhea
chlamydia
virus
HSV
HPV
Bact. vag
Candida
Trichom
Chr. granul.
T.B
Non-specific
strept, staph
E. coli
Route
Ascending
Direct spread
e.g. appendicitis
Blood
Acute
Chronic
glands r' racemose
glands r' in depth
1. Resolve
2. Abcess
3. Reccurence
sympt
signs
FAHM-R
Abd. pain
cong. sympt
[pain, bl, disch]
Feverish
Swelling
Tenderness
Discharge
FHC
4. Perisalpingitis
suppurative
catarrhal
1. Pyosalpinx
2. Hydrosalpinx
3. S I N
Salpingitis Isthmica Nodosa
T.O. cyst
T.O. abscess
Pyometra
stenosis
cancer
Parametritis
through lymphatics
Pelvic abscess
4 atrophy
5 hypertrophy
glands
Retension
Sympt of G > chl
Major criteria
Minor criteria
1. abd
2. adnexal
3. cx motion
1. Job
ESR
TLC
2. mass
3. organisms
History of
ectopic
recurrent acute PID
Sympt
infertility
+ congestive sympt
local
Tenderness Fixed
TO mass
Fixed RVF
intermittent purulent disch.
tender swelling pushing
uterus to other side
tender swelling in
Douglas p. → pr. manif.
History
recc. cervicitis
Sympt.
infertility
+ cong. sympt
local
pathology
PPd
red
hot
1) Fates
Resolution
abscess
Recurrence
2) Septic focus
3) Spread
local
general
(as in septic ab)
4) Infertility
Tubes
hostile cx
5) If preg.
ectopic
choriam.
PROM
PTL
6) Malig. ?
HPV 16,18
Acute phase reactants
ESR, TLC, CRP
bl sugar
Culture
X sensitivity
Diagnosis
U/S
TO mass
Laparoscopy if
No improvement
uncertain diagnosis
Comp (infertility)
HSG or laparoscop
Etiology
TB → chest x-ray
B → biopsy
Sounding of cervix
Pyometra
pus
followed by D&C
late to exclude cancer
Comp
infert. → post-coital test
malig. → Colposcopy
Prophylaxis
avoid sex promiscuity
aseptic technique
General
Specific
acc. to C&S
Comp
e.g. infertility
Hospit. if
Low parity
Large mass T.O. mass
ruptured mass
Abs
Cephalosporin + Doxycyclin
Dalacin-C
or post. colpotomy
or aspiration
Drainage by Laparotomy
< 40 yr
(or infert)
unilat. adnex
= Conservative
> 40 yr
(or bilat)
T A H + B S O
= Radical
Pelvic clearance
Pelvic abscess as chr. PID
No masses
Abcts
masses
< 40
> 40
Cauterization
1. Diath
2. Cryo
3. Chem.
4. Laser
Surgery
Conization
Total hysterectomy
Pdf.
sexual interc.
operation
D&C
abortion
delivery
trauma
chemical
2ry
Fistula
Ectopic
may be due to
Foreign body
prepub. → x-ray, vaginoscope
Tumor
postmenop. → Pap smear, pipelle
Tampoon
Toxic shock → Staph. aureus
D.M
reccurence esp. → Bartholin